education policy analysis archives

A peer-reviewed, independent, open access, multilingual journal



Arizona State University

Volume 19 Number 1

10th of January 2011

ISSN 1068-2341

Choice without equity: Charter school segregation

Erica Frankenberg The Pennsylvania State University

Genevieve Siegel-Hawley University of California, Los Angeles

Jia Wang University of California, Los Angeles

Citation: Frankenberg, E., Siegel-Hawley, G., Wang, J. (2011) "Choice without equity: Charter school segregation." *Educational Policy Analysis Archives, 19* (1). Retrieved [date], from http://epaa.asu.edu/ojs/article/view/779

Abstract: The political popularity of charter schools is unmistakable. This article explores the relationship between charter schools and segregation across the country, in 40 states, the District of Columbia, and several dozen metropolitan areas with large enrollments of charter school students in 2007–08. The descriptive analysis of the charter school enrollment is aimed at understanding the characteristics of students enrolled in charter schools and the extent to which charter school students are segregated, including how charter school segregation compare to students in traditional public schools. This article examines these questions at different levels, aggregating school-level enrollment to explore patterns among metropolitan areas, states, and the nation using three national datasets. Our findings suggest that charters currently isolate

Manuscript received: 6/02/2010 Revisions received: 8/20/2010 Accepted: 10/01/2010 students by race and class. This analysis of recent data finds that charter schools are more racially isolated than traditional public schools in virtually every state and large metropolitan area in the nation. In some regions, white students are overrepresented in charter schools while in other charter schools; minority students have little exposure to white students. Data about the extent to which charter schools serve low-income and English Language Learners is incomplete, but suggest that a substantial share of charter schools may not enroll such students. As charters represent an increasing share of our public schools, they influence the level of segregation experienced by all of our nation's school-aged children. After two decades, the promise of charter schools to use choice to foster integration and equality in American education has yet to be realized.

Keywords: School choice; school demography; student diversity; educational policy

Selección sin equidad: Segregación escolar en las escuelas charter

Resumen: La popularidad política de las escuelas "charter" es inconfundible. Este artículo explora la relación entre las escuelas charter y la segregación en el país, en 40 estados, el Distrito de Columbia, y varias docenas de áreas metropolitanas con gran cantidad de estudiantes inscriptos en escuelas "charter" durante los años 2007-08. El análisis descriptivo de la matrícula escolar en las escuelas charter tiene el objetivo de comprender la matrícula y características de los alumnos de las escuelas charter y en que medida los estudiantes de escuelas charter están segregados, incluyendo la formas de segregación escolar y compararlos con estudiantes de escuelas públicas tradicionales. Este artículo examina esas cuestiones en diferentes niveles, la matrícula escolar agregada por nivel para estudiar los patrones en áreas metropolitanas, estados y la nación con tres conjuntos de datos nacionales. Nuestros hallazgos sugieren que las escuelas charter aíslan a los estudiantes por raza y clase. Este análisis de datos recientes encuentra que las escuelas charter son racialmente más aisladas que las escuelas públicas tradicionales en prácticamente todos los estados y en las áreas metropolitanas más grandes del país. En algunas regiones, los estudiantes blancos están sobre-representados en las escuelas chárter, mientras que en otras escuelas chárter, los estudiantes de minorías tienen poca interacción con los estudiantes blanco. Los datos sobre el grado en que las escuelas charter sirven a estudiantes de bajos ingresos y que precisan aprender Inglés son incompletos, pero sugieren que una parte sustancial de las escuelas charter no están atendiendo a esos estudiantes. Como las chárter representan una parte creciente de las escuelas públicas, influyen en el nivel de segregación experimentada por todos los niños en edad escolar del país. Después de dos décadas, la promesa de las escuelas "charter" para usar procesos de elección para fomentar la integración y la igualdad en la educación estadounidense aún no se han concretado.

Palabras claves: elección de escuelas; demografía escolar; diversidad estudiantil; políticas educativas

Escolha sem equidade: Segregação escolar nas escolas charter

Resumo: A popularidade política das escolas charter é inconfundível. Este artigo explora a relação entre as escolas charter e a segregação no país, em 40 estados, o Distrito de Columbia, e dezenas de áreas metropolitanas com grande número de alunos matriculados em escolas charter durante os anos 2007-08. A análise descritiva das matrículas escolares nas escolas charter visa compreender as características de ensino e dos estudantes de escolas charter e em que medida os alunos das escolas charter são segregados, incluindo as formas de segregação escolar, e compará-los com os alunos de escolas públicas tradicionais. Este artigo analisa estas questões em diferentes níveis, agregando as taxa de matrícula nas escolas para estudar os padrões nas áreas metropolitanas, estados e do pais com três conjuntos de dados nacionais. Nossos resultados sugerem que as escolas charter isolam os alunos por raça e classe. Esta análise de dados recentes indica que as escolas charter são racialmente mais isoladas do que as escolas públicas em quase todos os estados e nas principais regiões

metropolitanas do país. Em algumas regiões, os estudantes brancos estão sobrerepresentados nas escolas charter, enquanto, os alunos de minorias raciais e étnicas têm pouca interação com os estudantes brancos nas escolas charter. Dados sobre a extensão do atendimento, nas escolas charter, aos alunos de baixa renda ou àqueles que necessitam aprender inglês são inconclusivos, mas sugerem que uma parte substancial das escolas charter não estão atendendo a esses estudantes. Como as charter representam uma parte crescente das escolas públicas, elas afetam o nível de segregação experimentada por todas as crianças em idade escolar no país. Depois de duas décadas, a promessa das escolas charter de usar processos de escolha escolar para promover a integração e a igualdade na educação americana ainda não foi realizada.

Palavras-chave: escolha escolar; demografia escolar; diversidade de estudantes; política educacional.

Introduction

Charter schools vaulted into the education policy arena several decades ago. In 1990, not a single charter program appeared on the American educational landscape; 20 years later, their rapid ascension in political popularity has coincided with rapid growth in enrollment. In its first year in office, the Obama Administration has promoted charter schools as a central component of educational reform. In two major funding programs, with billions of dollars at stake, the U.S. Education Department is giving priority to states and districts committed to quickly expanding the number of charter schools.¹ Further, the Administration's first two budget requests have contained increased funding for charter schools.²

Despite rising interest, however, charter students represented only 2.5% of total public school enrollment in 2007–08. Charter schools are most likely to comprise a significant portion of the market share in big cities like New York, Detroit, St. Louis, Washington, D.C. and New Orleans.³ As the growing ranks of charter school attendees swell to include a disproportionately high number of Black students, troubling patterns of segregation emerge. Charter programs are more likely than traditional public schools to generate racially isolated learning environments for students of color, though in some communities they produce schools of white segregation. These charter trends motivate the analysis described in this article.

Fifty-five years after the landmark U.S. Supreme Court decision in *Brown v. Board of Education*, segregation remains durably linked to limited opportunities and a lack of preparation for students of all races to live and work in a diverse society. Minority segregated schools are persistently linked to a wide array of educational and life disadvantages (Linn & Welner, 2007). Students in segregated

¹ The Race to the Top is a competitive funding program for K-12 education that allocates points for states that raise or eliminate caps on establishing charter schools. A number of states moved to consider passing charter school legislation or raising their existing cap on charter schools in advance of the January 19, 2010 deadline for state applications for the first phase of Race to the Top funding (Dillon, 2010). As part of another Department of Education's funding program to Title 1 schools for school improvement, converting to charter schools is one of only four options available to schools in order to receive \$3.5 billion funding. For more information, see http://www.ed.gov/news/pressreleases/2009/12/12032009a.html (accessed on January 18, 2010).

² See Administration's FY 2010 budget request beginning at F-75 at http://www.ed.gov/about/overview/budget10/justifications/f-iandi.pdf (accessed on January 18, 2010). See also http://www2.ed.gov/about/overview/budget/budget11/summary/edlite-section3a.html#expanding (accessed on February 1, 2010).

³ In fact, in New Orleans, where a major push from the Bush Administration to convert to charter schools occurred in the aftermath of Hurricane Katrina, 57% of students attend charter programs (National Alliance for Public Charter Schools, 2009; Gumus-Dawes & Luce, 2010).

schools, charter or otherwise, are likely to have limited contact with more advantaged social networks (often linked to information about jobs and higher education) and fewer opportunities to prepare for living and working in a diverse society (Braddock, 2009). As a result, it is important to consider what extent of interracial exposure— or lack thereof—the growing sector of charter schools provides for students. This article explores the experiences of charter school students in terms of the racial, socioeconomic, and linguistic composition of their peers.

Concerns about racial isolation are largely absent from conversations about charter schools. Instead, access to school choice is now recast as a civil rights issue. Charter school proponents have traditionally been guided by a central tenet: Charters will improve student outcomes (measured almost exclusively by academic achievement) through the introduction of free market competition in the public school system. Other supporters of the movement hold that charter schools can serve as laboratories of innovation by operating as relatively autonomous public school environments (Chubb & Moe, 1991; Finn, Manno, & Vanourek, 2006; Friedman, 1955). Further, in terms of equity issues, the influx of educational choices provided by charter schools in some inner-city areas in particular has led some advocates to depict charters as part of the "unfinished civil rights movement," giving parents an alternative to low-performing traditional public schools (Holt, 2000; Stulberg, 2008; Wamba & Asher, 2003).

Access to School Choice

The ability to choose assumes ready exposure to available school options. Research suggests that families' access to the educational marketplace is unequally constrained by a number of factors, including contact with advantaged social networks through which information regarding school quality is exchanged, language barriers, socioeconomic status and the ability of parents to arrange transportation for their schoolchildren (Fuller, Elmore, & Orfield, 1996; Bell, 2009; Koedel et al., 2009). Education studies both in the U.S. context and abroad, from England to New Zealand to Chile, all highlight a basic point. Unrestricted choice results in stratification (Gewirtz, Ball, & Bowe, 1995; McEwan, 2008; Morphis, 2009). Take, for example, the application process for a new charter school specializing in math and science. A parent or student must first hear about the charter program, which is dependant on the extent to which the new school has conducted outreach and advertising, whether materials were available in multiple languages, and if an encounter with another parent or contact provided information about the charter. The family must then navigate the application process, which often involves a lottery but also can mean a combination of other requirements like testing, teacher recommendations, parental involvement commitment,⁵ or essays. If the student is accepted, then transportation to and from the school may have to be provided by the parent.

On the other side of the process, schools may also have incentives to serve a certain population. While charter schools receive public funding like other public schools, significant private investment augments public support for charter schools.⁶ Targeted recruitment of students could

⁴ Although not as central to the discussion of charter schools, some have noted charters' non-reliance on established attendance zones--compared to public school zones that typically help link neighborhood segregation to school segregation--as a way charter schools could help combat racial isolation and promote inter-district learning opportunities (Eaton & Chirichigo, 2009).

⁵ Requiring parental time commitment may indicate that charter schools have a more advantaged student body than surrounding public schools that don't have similar requirements (e.g., Carnoy, Jacobsen, Mishel & Rothstein, 2005, chapter 4).

⁶ Examples of management organizations funded by private investors include Green Dot, KIPP, and Uncommon Schools (Scott, 2009). Of course, some public school districts in wealthy areas also have non-profit foundations set up to augment public funding as well.

help charter schools accomplish achievement promises made to these private funders. It follows that school choice, unless carefully constructed and implemented with consideration for the above obstacles, will usually exacerbate inequality. A recent study of the different school choice programs in San Diego, which found that choice programs like magnet schools that had mechanisms supporting integration such as transportation were more integrated than their open enrollment or charter school choice options that did not have such structures to encourage integration (Betts, Rice, Zau, Tang & Koedel, 2006).

Political Framework of School Choice

Choice framed one way aligns well with its proponents' unqualified advocacy of markets, competition and privatization. It also appeals to other sectors by offering an exit option—though not a systematic solution—from deteriorating central city school systems. The mere presence of educational alternatives to underfunded and highly segregated urban schools, long mired in the fallout from the Supreme Court's failure to authorize widespread metropolitan desegregation solutions, offers hope (Stulberg, 2008). While the philosophical underpinnings of school choice emanated from Friedman's economic theories, the notion quickly gained traction among some low-income constituents, communities of color and advocates who wished to found their own schools (Wells, et al., 2005).

Framed another way, however, choice has—and continues to be—an essential element of long-standing and successful racial integration programs. Because school choice disrupts a common reliance upon neighborhood school zones (which often means that patterns of residential segregation are replicated in school populations), it provides a mechanism for attracting a student body from a much larger, and often more diverse, geographic area. Magnet schools, one of the oldest and still the largest form of school choice, rely upon this feature and were designed for the express purpose of integration. Presented as an alternative to mandatory busing, magnets were typically established with desegregation goals and transportation and outreach provisions. Managed choice assignment plans⁷ have been another popular strategy for promoting educational equity. They give parents the option of ranking a certain number of schools but cede control to the district to make the final assignment decision. District-managed choice decisions are typically based on a set of decided factors (i.e. racial or socioeconomic composition of schools, student achievement, and sibling status) to help ensure school-level diversity.

Early proponents of charters touted the programs, which generally do not have established attendance zones, as another opportunity to rupture school boundary lines that continue to bond racially isolated neighborhoods to their schools. They differ at the outset from strategies like managed choice plans, however, because charter schools make admissions decisions independently of the effect on other schools. In a managed choice plan, for example, a district considers how assignment decisions will effect the racial composition of all district schools. Perhaps partly because of these distinctions, prior research suggests that charters have not made good on their initial integrative vision. As a result, charters have decidedly trended toward the first–market-oriented–model of choice.

This article seeks to understand how the growing charter school sector relates to persistent patterns of racial, economic, and linguistic segregation in our nation's public schools. A review of existing literature also finds, at best, mixed evidence regarding the claim that charters are associated with improved academic outcomes. On the other hand, there are some excellent, diverse, and widely

⁷ Also referred to as "controlled choice." Locales with longstanding controlled choice plans include San Francisco and Berkeley, California, and Cambridge, Massachusetts.

publicized charter schools. They are places of high academic achievement and social inclusion that conscientiously facilitate student body diversity through policy and outreach.

Student Outcomes in Charter Schools: Strong Evidence of Segregation, Mixed Achievement and Attainment Results

Segregation among all U.S. public schools is growing (Orfield, 2009). Moreover, while less scholarly attention has focused on charter school segregation specifically, a consensus is emerging in the literature on this topic. Research overwhelmingly identifies many charter schools as segregated learning environments, regardless of whether this is being measured at the national, state or district level (Carnoy, et al., 2005; Finnigan, et al., 2004; Frankenberg & Lee, 2003; Garcia, 2007; Nelson, et al., 2000; Renzulli & Evans, 2005). These findings are in keeping with a broader literature about the potential pitfalls of school choice without civil rights protections. Evidence suggests the ability to access the educational marketplace is heavily dependent upon a number of factors, including the provision of transportation and extensive outreach to all communities (Frankenberg & Siegel-Hawley, 2009; Fuller, Elmore, & Orfield, 1996). Without appropriate measures to equalize information and mobility, studies show that utilization of educational options--including vouchers and private academies, in addition to charter schools--results in higher levels of segregation than if students attended assigned zone schools (Bifulco, Ladd, & Ross, 2009; see also Saporito & Sahoni, 2006).

Keeping these broader lessons about educational choice in mind, we review studies documenting the extent of racial segregation within charter schools, as well as segregation of charter schools in comparison to that of traditional public schools. We also examine current knowledge about the extent to which low-income and English Language Learners are served by, and are isolated in, charter schools.

Racial Isolation

Several large federal studies provided early information on enrollment trends in charter schools. Four annual reports were conducted between 1996 and 2000, with two more released since 2000. Each of the six reports utilized the National Center for Education Statistics' Common Core of Data (one of the primary data sources used in our analysis) to document increasing charter student enrollment, along with trends in racial isolation. The 1999 federal analysis, for example, found that charter schools in 6 of 24 states with charter schools at the time—Massachusetts, Connecticut, Michigan, Minnesota, North Carolina and Texas—served higher percentages of students of color than public schools in those states (Berman, et al., 1999). A year later, the 2000 report unequivocally declared, "In most states, the racial-ethnic distribution of charter schools did not mirror the distribution in all public schools" (Nelson, et al., 2000, p. 32). To illustrate: in 1997-98, Black students made up nearly 34% of the population of charter schools in Texas, while public schools in the state were roughly 14% Black (Nelson, et al., 2000). The last federal report in 2004, based on an analysis of three years of data, again found significant differences between traditional public schools and overall charter school enrollment of African American, Hispanic, and White students. Additionally, the researchers noted that minority enrollment in charter schools continued to climb, making up nearly two-thirds of all charter school students in 2001-2002 (Finnigan, et al., 2004).

A similar study by the Harvard Civil Rights Project, conducted around the same time period, analyzed charter school enrollment and segregation at the state and national level based on NCES data from 2000-2001. It corroborated the findings from the last federal evaluation and helped elaborate on racial isolation for Black students in particular. Seventy percent of Black charter school students in the country attended hyper-segregated minority schools in 2000–01 (compared to 34%

of Black students enrolled in traditional public schools)— schools where more than 90% of students were from underrepresented racial backgrounds (Frankenberg & Lee, 2003; Miron, Urschel, Mathis & Tornquist, 2010).

Supplementing analyses that were broad in scope, a number of case studies focusing on charter schools in particular states or metro areas have documented increasing racial segregation associated with charter schools. A 2008 report on charters in the Twin Cities showed that charter schools have been associated with heightened racial and economic segregation in the metropolitan area. Within the Minneapolis-St. Paul metro region, the study found charters had a variety of different segregating effects. In some instances, minority segregation in charter schools was more extreme than nearby, already highly segregated, traditional public schools (Institute on Race and Poverty, 2008). In other cases, the reverse scenario was true. Evidence of White isolation in some Twin Cities' charter schools was illuminated after comparing racial-ethnic enrollments at diverse public schools in close proximity to a White segregated charter school. Researchers discovered that many of these White segregated charters employed sorting mechanisms, including interviews, requirements for parent involvement, and disciplinary policies, to selectively enroll applicants (Institute on Race and Poverty, 2008).

Research conducted using mapping technology in New Jersey came to a similar conclusion: charter schools' attendance zone flexibility does not necessarily produce reduced levels of racial isolation. Looking at student demographics in New Jersey school districts, census tracts, and census block groups (i.e. neighborhoods), the study documented the highest levels of black segregation in neighborhoods immediately surrounding charter schools (d'Entremont & Gulosino, in press). This finding suggests that charter school site selection in the state typically occurs in or near minority segregated neighborhoods. The authors further conclude, based on evidence of neighborhood-level isolation, that studies comparing charter school enrollment to overall school district enrollment may be underestimating the severity of racial segregation (d'Entremont & Gulosino, in press). The authors of the New Jersey study are not the first to express concerns regarding district-level analyses of charter school segregation. Other researchers note that many charter school enrollments are not necessarily associated with or drawn from a particular school district (Frankenberg & Lee, 2003; Garcia, 2007), rendering charter enrollment comparisons to district demographics problematic. In Arizona, for example, students attending charter schools within a single district boundary line were actually drawn from 21 different districts (Gifford, Ogle, & Solomon, 1998).

Research from a number of different states finds that while charter schools in certain areas have a higher percentage of White students than traditional public schools—fueling concerns that they may act as havens for "white flight" (Renzulli & Evans, 2005)—a far greater number of charter schools are more segregated for minority students than other public educational settings (Ni, 2007). An analysis of charter school attendees in Arizona tracked individual student movement from public schools to charters over four years. The study disaggregated charter school segregation by grade level, finding that elementary charter schools in the state tended to be slightly more segregated than charter high schools, mirroring patterns in traditional public schools (Garcia, 2007). Patterns of White isolation in some charters were uncovered, as well as high numbers of minority students in others (Garcia, 2007).

A different study using longitudinal student level data from California and Texas discovered that Black students in both states were more likely to transfer into charter schools, and that their charter schools were more likely to be racially isolated than the school previously attended (Booker, Zimmer, & Buddin, 2005). In addition, another study from these two states, supplementing by an analysis of other sites, used similar research methods to track movement into charter schools in seven cities and states. The study determined that in five of the seven locales, the movement of Black students to charter schools meant these students attended more segregated schools (Zimmer,

et al., 2009; see also Bifulco & Ladd, 2007). In the remaining two locations, Chicago and Milwaukee, Black students attended slightly less segregated charter schools than they would have if they remained in public schools, though both traditional school systems contained very low percentages of White students (Zimmer, et al., 2009). The study also found more mixed enrollment patterns for White and Latino students.

Prior research, then, strongly suggests that charter programs have not lived up to their initial promise of transcending the segregating effects of traditional district boundary lines. In fact, these studies indicate charters exacerbate already rampant school segregation, particularly for Black students. At the same time, the *extent* to which charter schools further segregate students across different locations is still subject to debate. In the 2009 study of seven locales, for example, the authors noted that while substantial differences in the overall racial composition of charters and traditional public schools did exist, in many cases the differences for students moving from a traditional school to a charter were less than 10 percentage points (Zimmer, et al., 2009).⁸

Some charter schools do a better job of integrating students than others (Petrilli, 2009). These institutions enroll a racially diverse student body, in addition to being recognized for innovative and excellent educational opportunities. The schools employ some type of lottery to manage oversubscription. D.C.'s Capital City Charter School uses a simple random lottery, while the other two take extra steps to ensure diversity by employing a lottery weighted towards low-income children at DSST and a zip-code based lottery (recognizing San Diego's racially segregated housing patterns) at HTH (Petrilli, 2009). These schools serve as a reminder that current patterns of segregation in charter schools can— and should— be avoided with the help of carefully designed policies. Such policies would promote charter school enrollments that roughly reflect the demographics of the surrounding area, in addition to ensuring proper levels of within-school diversity.

Economic and Linguistic Isolation

Evidence also indicates that charter schools are associated with heightened economic segregation, which research has often linked to weak schooling opportunity. Some states report charter schools serving disproportionate numbers of relatively affluent students who are *not* eligible for free or reduced priced lunches (FRL), while others report higher levels of FRL-eligible students (e.g., low-income students) in charters. Federal charter school reports documented a national trend of over-enrollment for students eligible for free or reduced priced lunches in charter schools. The last Department of Education report, based on data from 2001–02, found differences in the percentages of FRL-eligible students served by charter schools (43%) versus traditional public schools (38%) (Finnigan, et al., 2004). In addition, the percentage of low-income students served by charter schools increased fairly dramatically over the period of the federal reports, from 39% in 1998-99 to 43% in 2001-02 (Finnigan, et al., 2004). In other words, the federal evaluation found that nationally, charters were more likely to serve economically disadvantaged students and grew increasingly more likely to do so over time.

By contrast, a 2005 book, *Charter School Dust-Up*, examining existing research on national patterns in charter school enrollment and achievement, found that charter schools enroll, on average, *more* economically advantaged student populations (Carnoy, et al., 2005). In California, for example, 38% of charter middle school students were considered low income compared to 51% in traditional public schools (Carnoy, et al., 2005). The 2005 National Assessment of Educational Progress (NAEP) data also show that Black students attending charter schools are slightly more

⁸ Generally speaking, one of the research challenges in measuring charter school segregation is determining a reference group of public schools.

privileged than their public school counterparts, along with a 2003 NAEP Pilot Study suggesting a similar pattern of wealth advantages for charter students of all races when compared with traditional public school students (Carnoy, et al., 2005; ED NAEP Pilot Study, 2003).

Though research differs on whether charters are schools of more or less economic privilege, and that these patterns may vary from state-to-state, data do suggest that charter programs are not enrolling a representative percentage of free and reduced lunch (FRL) price-eligible students (Finnigan, et al., 2004). An additional issue complicating our evaluation of these ambiguous findings relates to the general problems of availability and reliability of charter school FRL data.⁹

Charter schools, like other public schools, are required by law to serve Special Education and English Language Learners (ELL), but there are serious questions about the extent to which they presently do so. A number of studies show that charter schools educate significantly fewer students with disabilities than regular public schools (Finnigan, et al., 2004; Nelson, et al., 2000; Welner & Howe, 2005), in part by employing "counseling" mechanisms during the charter admissions process to deter students who participate in Special Education programs. Further, while English Language Learners appear to be served in similar proportions by charter and public schools at the national level (Finnigan, et al., 2004), some differences exist at the local level. In Massachusetts, a state with a large ELL population and comparatively restrictive language policies (in addition to being in the midst of a debate regarding the expansion of charter schools), recent reports suggest that charter schools are under-enrolling ELLs overall and serving few—if any—recent immigrant students who are just beginning to learn the English language (META, 2009).

By and large, research suggests that charter school enrollments differ substantially from traditional public schools. They isolate, on average, economically distinct (either more advantaged or less) students in White-segregated or minority-segregated schools that serve fewer students with disabilities. These patterns matter for many reasons, and studies examining the effectiveness of charter schools should be evaluated with the knowledge that charter programs are educating students that differ from traditional public school students in measurable, and perhaps immeasurable, ways. We turn now to examination of the evidence regarding student achievement and attainment in charter schools.

Achievement and Educational Attainment in Charter Schools

Our discussion of the educational outcomes of students in charter schools is limited primarily to evaluating the academic achievement scores of students, due to the dearth of literature on other measures of students' academic or non-academic outcomes. This is, of course, a very narrow evaluation of the extent to which schools are achieving the broader goals we have for public schools and the students they educate. Much more extensive examination of the educational experiences of charter school students is essential.

⁹ Free and reduced-priced lunch eligibility is the most commonly used measure of poverty in schools. There are, however, a number of issues that make such heavy reliance on FRL data troubling, including evidence suggesting that stigma-sensitive high school students are less likely to participate in the program (Pogash, 2008; Kurki, Boyle, & Aladjem, 2005). FRL-eligibility is also a dichotomous measure of poverty – a student is either above the poverty line or below it - prohibiting a nuanced grasp of the varying levels of poverty (see also Lubenski & Crane, 2010).

¹⁰ Under federal law, Special Education students are entitled to a "free and appropriate public education" (FAPE). Typically, if a traditional public school in a given district and state is obligated to provide special education services, a charter is as well. If a student needs more special education support and services than a regular public school would be expected to provide, the charter school would also not be obligated (though the district in which the student resides must still supply FAPE). Evidence suggesting charter schools are inappropriately screening Special Education students is, in effect, documentation of an illegal practice.

Conclusions drawn from the literature on student achievement in charter schools are considerably murkier than those related to segregation. Broad discrepancies in state charter laws, achievement tests, and metrics make large-scale analyses or comparisons of outcomes difficult. A charter school in one state may operate and select students under very different regulations and incentives than a charter school in another state. Many achievement studies deal with a specific locale, resulting in a more nuanced understanding of that geographic area, but one that is not necessarily generalizeable to understanding the larger relationship between charter schools and improved student outcomes. A second issue in the achievement literature emerges due to selection bias, or the concern that students who self-select into charter or choice programs are not a random sample of all public school students. In other words, charter school attendees are not comparable to their public school peers in a basic but difficult to measure way by dint of the initiative demonstrated by interest in exploring educational alternatives and undergoing what could be an extended process to enroll in a charter school. 11 The collection of studies described here attempts to account for this built-in bias in various ways, particularly by using achievement data from charter school lotteries and comparing students who attended the charter program to those who applied but did not gain entry. It should be noted, however, that achievement information for students who were not admitted to charter schools can be difficult to acquire. Apart from difficulties in comparing the achievement of students entering a charter program to those staying in a traditional public school, differential attrition rates also make it hard to ascertain the actual impact of charter school attendance on student achievement (META, 2009).12

In general, analyses that consider charter schools across the country tend to produce results suggesting that charter achievement lags behind traditional public school achievement, while state-level studies find more mixed results (Carnoy, et al., 2005; Finnigan, et al., 2004; Henig, 2008; Hoxby, 2004; IRP, 2008). Two recent studies from Stanford highlight this tension. The first compared charter school lottery "winners" (e.g., those who were offered admission and enrolled) and "losers" (those who did not enroll in charter schools) in New York City. The study found that eighth grade charter school students performed roughly 20 to 30 points higher than their public school counterparts on the state math and reading assessments. According to the analysis, the score differentials helped reduce the urban-suburban achievement gap in the New York metropolitan area by roughly two-thirds (Hoxby, Murarka & Kang, 2009). Further, the study concluded that charter school attendees were more likely to earn a Regents diploma, signifying success on the state high school exams, the longer they remained in a charter school setting (see also Viadero, 2009a, 2009b; Reardon, 2009).

A second much larger 2009 study from the Center for Research on Education Outcomes (CREDO) at Stanford University detailed charter achievement in fifteen states and the District of Columbia. CREDO found decidedly mixed student achievement outcomes. Using a longitudinal sample of students from charter schools, in conjunction with statistically crafted virtual demographic "twins" attending public schools, the CREDO study concluded that 17% of charter schools provide exceptional achievement results, while nearly half provide interchangeable results compared to public school students. Importantly, 37% of charter programs in the 16 state sample delivered

¹¹ Evidence suggests, for example, that KIPP academies (a well-known set of charter programs) recruit disadvantaged students who are known for being more highly motivated (Carnoy, et al., 2005; Tough, 2008). Some charter programs--including KIPP--also require a commitment of parent involvement (i.e. signing a contract) that prohibits the enrollment of some students.

¹² If a charter school pretests students and those in trouble return to public schools, those remaining would have higher scores but not necessarily because of something in the educational process of the charter schools.

achievement scores significantly *lower* than public school performance (CREDO, 2009). The researchers additionally noted that results fluctuated significantly across states.

The CREDO study is also one of the few that addresses the achievement of ELL students in charter schools. Researchers describe a largely positive set of findings for ELL charter students, with overall gains in both reading and math compared to their public school counterparts (CREDO, 2009). These heightened levels of charter achievement are present in states educating large numbers of ELLs, including California, Arizona, New Mexico and Texas. Perhaps related to these encouraging outcomes, charter schools in both California and Arizona are among the few educational settings still hospitable to bilingual education. Restrictive language policies¹³ prohibit most bilingual instruction in traditional public schools in California, Massachusetts, and Arizona, yet research consistently shows that high quality bilingual education programs are associated with positive learning outcomes for English Language Learners (Gándara & Hopkins, 2009).

Importantly, both the CREDO and New York charter studies have not been immune to methodological critique. The authors traded a round of accusations regarding the misuse of methodological techniques, with other researchers weighing in as well. The rancorous nature of the dispute underscores the political and policy debates swirling around the effectiveness of charter programs.

Case studies, which by their nature emphasize different state and local level trends, produce a variety of findings on charter students' achievement. In Minnesota, the first state to pass charter school legislation in 1991, a recent report based on a statistical analysis of Twin Cities' elementary school achievement data found that

Minnesota charter schools failed to deliver the promises made by charter school proponents. Despite nearly two decades of experience, charter schools in Minnesota still perform worse on average than comparable traditional public schools. Although a few charters perform well, most offer low income parents and parents of color an inferior choice--a choice between low-performing traditional public schools and charter schools that perform even worse. (University of Minnesota's Institute on Race & Poverty, 2008, p. 1)

According to the Institute on Race and Poverty's report, most charter schools in the Twin Cities are producing less than desirable achievement outcomes. A North Carolina-based research project uncovered a link between lower test scores and the segregation of charter school students. The authors found that charters in the state had larger negative effects on the achievement of Black students—who were more likely to opt into the charter system than other racial groups—than for White students (Bifulco & Ladd, 2007). In other words, Black students in North Carolina who made a racially segregating transfer into a charter school experienced larger negative achievement effects than if they had remained in a traditional public school (or made a non-segregating transfer to a charter).

Another case study utilizing student-level data, this time in two large urban school districts in California, found that charter school achievement is no better and no worse than traditional public school achievement scores (Zimmer & Buddin, 2006; see also Zimmer, et al., 2009). Further, the analysis suggested that student achievement did not vary substantially across the race or language status of charter students in Los Angeles Unified School District (LAUSD) or San Diego. As

¹³ Restrictive language policies refer to state-mandated limitations on bilingual education instruction. In California, for example, Proposition 227 requires all public school instruction to be conducted in English, with few exceptions. In the interests of preserving innovation, charter schools are exempt from these state laws if the chartering document designates an emphasis on bilingual instruction.

LAUSD continues to cede more control of low performing schools to charter school operators, this conclusion should be monitored as to whether charters are able to improve upon these achievement trends.

In Philadelphia, a working paper titled, Evaluating the Performance of Philadelphia's Charter Schools, determined that students' average gains while attending charter schools are statistically indistinguishable from the gains they experience while attending traditional public schools (Zimmer, et al., 2008). Further, the paper presented evidence counter to the market-based argument that increasing competition for students (via the introduction of charter schools) will stimulate the performance of nearby public schools. Specifically, the analysis found that charters had no effect on the performance of neighboring public schools (Zimmer, et al., 2008, see also Zimmer, et al., 2009). Other research from Ohio and Michigan suggests charter competition actually has a slightly negative impact on student performance in nearby public schools (Carr & Ritter, 2007; Ni, 2007). undermining the argument that charter competition produces improvement in public schools.

Beyond the nebulous competition effects, new research asserts that students enter charter programs more prepared than traditional public school students. A study produced by an economic think tank called *Ohio Matters* suggested that students entering both charter and magnet schools in several large, urban school districts in the state tested higher on early literacy kindergarten-readiness tests than their traditional neighborhood public school counterparts (Van Lier, 2009). Students entering choice-based schools in the state demonstrated a higher level of academic preparedness, which was in turn associated with higher third grade test scores—for different cohorts of students, however—in schools of choice (Van Lier, 2009). In sum, the authors suggest charter and magnet students in Ohio may have a head start in terms of academic preparedness.

Several studies have focused on charter school performance in Massachusetts, finding evidence of roughly comparable achievement between charters and traditional public schools, a tendency to under-serve ELL students, and high rates of attrition from charter schools. The recent spate of research from the area has been largely fueled by debate in the state legislature over Governor Deval Patrick's proposal to double the number of charter school openings in districts reporting the lowest scores on statewide tests. An analysis of Massachusetts reading and math test scores, averaged over a three-year period from 2006-2008, indicated that charter school students perform on par with other public schools (though one exception to this trend was found in a group of high-performing charter middle schools in Boston). Mass Partners found that student demographics, including race, poverty, and English Language Learner status were the most predictive variables for all schools—charter or traditional public— in determining student achievement in Massachusetts (Moscovitch, 2009). Multicultural Education, Teaching and Advocacy (META) also released a policy brief regarding ELL students and Massachusetts charter schools, finding a "mixed bag" of achievement for students learning the English language. The META brief summarizes state trends with the following statement: "There is no obvious indication that ELLs in Massachusetts charter schools are outperforming ELL students in local school districts" (META, 2009, p. 8). META also notes that definitive conclusions are complicated by low numbers of state charter schools reporting achievement data on ELL students.

Most of the studies reviewed thus far have focused on test scores, but an important goal of education, and therefore a critical way to evaluate a school's success, is the graduation of each student. Less is known about the rates of graduation for charter school students, though prior research about traditional public schools has uncovered a well-documented link between segregated high-poverty minority educational settings and dropout rates (Guryan, 2004; Orfield, 2004; Wald & Losen, 2005). One Boston-based study found that less than half of the city's charter students graduate from their high school in four years (Center for Education Policy and Practice, 2009). Charter school proponents have not disputed the findings, noting that higher scholastic standards

set by charter schools may lead some students to return to traditional public schools to earn diplomas (Vaznis, 2009). This evidence highlights the need for a better understanding of charter attrition rates and what happens to these students who transition back to traditional public schools, in addition to more information about graduation rates.¹⁴

On the other hand, evidence from two other states finds a significant positive relationship between attendance at a charter high school and educational attainment (Booker, et al., 2008). After controlling for key student characteristics (e.g., race, ethnicity and poverty level) and 8th grade test scores in a student-level dataset gleaned from a variety of state and local sources, researchers discovered that charter middle school students in Florida and Chicago opting to attend a charter high school were 7 to 15 percentage points more likely to earn a standard diploma than those electing to attend a traditional public high school (Booker et al., 2008; Zimmer, et al., 2009). The researchers posit that the use of 8th grade charter test scores helped control for selection bias issues, allowing for a more accurate appraisal of the effects associated with attending a charter high school. The drawback to this approach is the limited pool of students studied. We know nothing, for example, about the graduation effects associated with students enrolled in traditional public middle schools that go on to attend charter high schools (Booker, et al., 2008; Zimmer, et al., 2009). The authors of this research note that few, if any, other studies have attempted to examine graduation and education attainment rates for charter school students.

Conclusions from Studies of Student Segregation and Educational Outcomes in Charter Schools

Several themes emerge in this review of the literature. First, research is moving towards consensus in terms of charter schools and segregation. Charter schools continue to be associated with increased levels of racial isolation for their students, either in terms of minority segregated schools or white segregated learning environments. Studies suggest that sorting students by socioeconomic status is linked to charters, as well as a propensity for charter schools to serve lower numbers of ELLs and students with disabilities.

The achievement data on charter schools is less conclusive. At the very least, however, a growing number of studies show that student test scores—and graduation rates to the extent they have been measured—vary widely across states and locales. And importantly, a charter school is not a form of education treatment, as implied by any number of studies describing the charter's effect on student achievement. It is merely a school that enjoys an unusual degree of autonomy under widely varying state laws.

A half century of research in public schools also tells us that segregated learning environments are associated with harmful short-term student outcomes like low test scores. The aforementioned study of North Carolina charter schools found that Black students transferring from a regular public school to a more segregated charter setting experienced harmful achievement effects, especially in math (Bifulco & Ladd, 2007). More generally, segregated minority schools also tend to have lower educational attainment, fewer job opportunities, a reluctance to pursue integrated relationships later in life, and an increased likelihood of holding prejudiced attitudes (see, e.g., Braddock, 2009; Linn & Welner, 2007). Given the racially isolated contexts of many charter schools, it is important to examine closely the potential for harmful outcomes on both test and non-test score related dimensions.

Achievement results should be viewed through a lens fogged with uncertainty regarding charter school attrition rates. Specifically, how many students are pushed out for low performance or behavior? And on the other side of the coin, how extensive are patterns of "counseling" special

¹⁴ Longitudinal data, often difficult to obtain, is required to further assess these charter-related issues.

education students away from charter schools—not to mention schools that screen out students whose families are unable to commit to a certain level of parental involvement (IRP, 2008; Welner & Howe, 2005)? And beyond our recent, persistent reliance on test scores as decisive indicators of school success, as a democratic society we should also care very much about other non-academic school functions. Very little data exists regarding other charter outcomes, like the social, emotional or civic development that occurs in and around schools. A single book examining D.C. charter schools addresses some of these issues, finding that charters in the nation's capital are not nurturing the social capital of parents or students, and making only a small difference in developing the civic capacity of their students (Buckley & Schneider, 2007). In short, we know very little—in the broadest sense—about the educational impact of charters, beyond a number of conflicting achievement studies. As a result, research documenting the ability of charters to produce engaged, empathic and responsible citizens and to provide opportunities for exposure to a wide variety of social and cultural networks that help open doors to college and career opportunities is much needed.

Finally, another noticeable gap in the research emerges. Despite the wealth of case studies on charter schools, few tackle the issues at a national level, with the notable exceptions of earlier federal reports and 2009 CREDO study.

Research Questions

In contrast to most of the studies described above, the following analysis will explore the relationship between charter schools and segregation across the country, in the 40 states, the District of Columbia, and several dozen metropolitan areas with large enrollments of charter school students. The descriptive analysis of the charter school enrollment, which comprises the bulk of this study, is aimed at answering two basic questions:

- (1) What are the enrollment and characteristics of charter school students?
- (2) To what extent are charter schools segregated, and how do they compare to traditional public schools?

We examine these questions at different levels, aggregating school-level composition to explore patterns among metropolitan areas, states, and the nation. By doing so, we can further understand the extent to which charter schools might be exacerbating or mitigating existing patterns of public school segregation, which is essential to consider for students and for society.

Data and Methods

To answer these questions, this analysis used three data sources: the 2007–08 Common Core of Data (CCD) collected by the National Center for Education Statistics, the 2006 Civil Rights Data Collection (CRDC) collected by the Office of Civil Rights at the Department of Education, and the 2007–08 Schools and Staffing Survey (SASS), also collected by the National Center for Education Statistics.

Most of the analysis in this study uses school-level CCD data, which is an annual national dataset of all public schools. It includes school information on student characteristics such as enrollment and racial and economic subgroups that are comparable across states, across time, and between charter schools and traditional public schools. In 2007–08, there were a total of 87,443 public schools in the CCD that were classified as regular schools and have at least one student enrolled. These schools enrolled 47,981,142 students across the 50 states plus the District of Columbia. Specifically, in 2007–08, there were 1,207,450 students enrolled in 3,883 charter schools,

and 46,773,692 students enrolled in 83,560 traditional public schools. In other words, charter schools enroll about a fiftieth of U.S. students, less than magnet schools.

In the CCD, values for the number of students participating in the Free and Reduced-price Lunch (FRL) program information are missing for a substantial number of schools, which accounts for a higher percentage of charter schools. While 2,868 charter schools (74%) reported at least one FRL student and 77,173 traditional public schools (92%) report at least one FRL student.

According to the CCD, the percentage of all public school students classified as ELLs in 2007-08 was 5%. With students' ELL information collected at the school district level in the CCD, we used district-level data in order to analyze the enrollment of ELL students in charter schools to the extent possible. Even at the district level, however, difficulties arose regarding ELL students. The ELL information is not reported for all school districts in four states—Maryland, Missouri, New Jersey, and South Dakota. In other states it was impossible to determine an enrollment of ELL students in "charter-only" local educational agencies. Among the states that do report ELL counts, California reported a total of seven ELL students across all school districts in the state. Since California remains a hub of immigration, this count indicates serious data reporting issues.

Because of concerns about missing data, we supplemented the CCD district-level ELL data with CRDC data for school-level information about Limited English Proficient (LEP) students. The CRDC began in the late 1960s, and the latest available dataset was from 2005-06. It is usually collected every two years, and the data are used to monitor racial disparities and other civil rights violations by the Department of Education, researchers, and advocates. The information collected includes students' school enrollment, educational services participation, limited English proficiency, disability status, and academic proficiency results. The data collection is mainly based on a stratified sampling methodology to ensure a representative sample of school districts from each state is included, but there is also a subset of districts, due in part to OCR's oversight responsibilities to ensure equal opportunity, that are included: districts with more than 25,000 students, districts in states with 25 or fewer districts, and districts subject to federal court order and monitored by the U.S. Justice Department. While only a fraction of school districts are sampled (around 6,000), because larger districts are automatically included, the dataset includes a large majority of all schools in the U.S. The 2006 CRDC included 62,484 public schools and 61,275 of these public schools reported zero or more students (e.g., those that reported a value and not "missing") classified as ELLs. A total of 52,901 public schools with ELL data are merged into the CCD data as these schools are classified as regular schools per CCD and report at least one student enrolled in the 2005-06 school year. The ELL data are available for 913 charter schools and for 51,988 traditional public schools.

We also used data from another federal dataset, the Schools and Staffing Survey, administered periodically by the National Center for Education Statistics. The 2007–08 SASS school data consisted of 7,572 schools. Of these, 6,734 schools are regular schools and 198 special program emphasis schools. We include regular and special program emphasis schools in the analysis reported here. Among this subset of schools, 161 are regular charter schools and 36 are special program emphasis charter schools. In particular, we used questions about whether the school offered the National School Lunch Program, whether the school enrolled any Limited English Proficient students and the counts of enrolled students by race.

The statistical analyses below compare the racial composition of charter schools with that of all traditional public schools by examining who is enrolled in charter schools (by race, socioeconomic status, and English Language proficiency) and the extent to which these students are segregated. After describing characteristics of the entire enrollment, the focus of the paper is largely on the 28 states plus D.C. that had total statewide charter enrollments of at least 5,000 students in 2007-08. Charter students in these 29 jurisdictions account for 97% of the entire U.S. charter school

population. The other 12 states contain the remaining 3% of the charter enrollment, 24,065 students.

In terms of charter school segregation, we use several measures to evaluate different school-level dimensions of segregation.¹⁵ One measure is to aggregate the school-level data to the state level to compare charter and public schools within a particular state as well as charter school segregation across states. Secondly, we calculate the exposure index to have an average picture of the interracial exposure of students: The index can be interpreted as the percentage of students of a particular racial group in the school of the average student of another group (Massey & Denton, 1988; Orfield, Bachmeier, James, & Eitle, 1997; Reardon & Yun, 2002).

Examining the exposure index gives us an average picture of interracial exposure in charter schools. However, this measure, which is essentially a weighted average of the racial composition of schools of students from each race, can mask the variation and distribution of students in schools. To explore the distribution of students in charter schools, we examine the concentration of students of all races in predominantly minority schools (greater than 50% of the student body is non-White), intensely segregated minority schools (90–100% minority), and intensely segregated white schools (90–100% White). Together, these measures portray both the actual level of interracial exposure in schools as well as the percentage of students attending racially imbalanced and isolated schools. It is important to note that using schools as our unit of analysis, this article aggregates the racial composition and exposure at the state level and, in some instances, to the metropolitan area level.

One characteristic common across all charter schools is that they operate under statewide charter school legislation that influences who can attend charter schools, and how many can be established. Charter school legislation differs widely among states. Demographic contexts of the entire state population also vary across the country, and these variations can affect the racial composition of the students in charter schools. Furthermore, although charter schools can enroll students across district and county lines throughout metropolitan areas, charter schools do not enroll students across state lines. A comparison between charter schools and public schools at the state level gives us important comparisons of the racial composition and segregation in the small but growing sector of charter schools within legislatively defined geographic boundaries. Our purpose in this article is not to discount the variation that occurs at the district and school level, but simply to focus on state-level (and, to a lesser extent, metropolitan area-level) observations of differences in racial composition between public schools and charter schools and how students are distributed among charter schools.

As discussed earlier, previous studies at the district and school level have shown that when examined in terms of their local contexts (comparing the racial enrollments of charter schools to that of the surrounding public school district or the closest public school), charter schools are less racially diverse than local public schools and districts (Ascher, Jacobwitz, & McBride, 1999; Cobb & Glass, 1999; Wells, et al., 2000). We recognize that the context of where schools are situated locally, educational funding incentives, and how districts chartering agencies choose to interpret state charter legislation are important considerations that likely influence segregation outcomes. It can be misleading, however, to look at charter schools at the district level, because in many states charters are often not part of a single school district or confined to drawing students only from that district. Indeed, early proponents of charter schools suggested they had the promise of drawing students across boundary lines and could address persistent segregation because they were not limited by district boundaries. As a result, comparing charter school enrollment and segregation only to the

¹⁵ Because many of our methods in this article were adapted from our earlier paper on charter school segregation, a prior version of this section was published earlier and has been adapted for this article's analysis (Frankenberg & Lee, 2003).

surrounding district may not fully reflect the student population charter schools could enroll and, instead, that the metropolitan area is a better comparison for charter school enrollment. Thus, in addition to our national and state-level aggregation of charter school enrollment, we also evaluate the enrollment, racial composition, and racial segregation of charter and traditional public schools in the 39 metropolitan areas that had at least 10 charter schools in 2007–08. The definition of metropolitan area used here is the CCD's definition of Core Based Statistical Areas (CBSA).

The Charter School Enrollment

The descriptive analysis of charter school student composition is organized thematically. It begins with a description of the size of the charter school enrollment. It next considers the racial composition and segregation of charter schools, comparing these trends to those of traditional public schools. Next, the geographical location of charter schools is investigated, and how it might relate to the characteristics of the aggregate charter school enrollment. Finally, the article considers in turn the extent to which low-income and English Language Learner students are served in charter schools, the concentration of these students among charters, and the overlap between race and poverty composition of students in charter schools.

The Growing Charter School Enrollment

In 2007–08, there were slightly more than 1.2 million charter school students across the country. Charter schools existed in 40 states plus D.C. In just seven years since the beginning of the decade, the enrollment of charter schools had more than doubled: in 2000–01, charter schools enrolled 444,000 and accounted for 1.2% of all public school students. By 2007–08, the charter enrollment was 1,207,450 and comprised 2.5% of all public school students in the U.S, and 2.7% of students in states that have charter schools.

Charter school enrollment varies widely from state to state. California, our largest state, also has the largest number of charter school students, with more than 200,000 students. By contrast, several states have less than 1,000 students enrolled in charter schools, which may indicate only a handful—or even one—of charter schools in the state. In fact, considering the substantial place that charter schools hold in our discussion of educational policy, it is remarkable to note in the vast majority of states—35 and D.C.—the charter school enrollment is less than 20,000 students (see table A-1 in Appendix). This suggests that the rhetoric about charter schools exceeds their actual presence in most states, even after two decades of growing federal support.

The charter school enrollment has increased in every state during the seven-year time period examined here. In many cases, charter school enrollment has grown rapidly during this time. Twenty states had charter school enrollments that more than doubled. Seven states and D.C. did not report a charter school enrollment in 2000–01. One of these states, New York, already had over 20,000 charter school students in 2007–08.

In addition to an increasing number of charter school students during the past seven years, there have also been an increasing number of charter *schools*. In fact, the number of charter schools nationally more than doubled to more than 3,800 schools over the seven years, albeit with a much smaller average size (see table A-2 in Appendix). For comparison, among traditional public schools

¹⁶ Twenty-four states with charter enrollments have less than 20,000 students and an additional 11 states have no charter school students at all.

during this same time period, the number of schools *declined*.¹⁷ While ten states have more than 100 charter schools, other states only have a few charter schools. In Connecticut, the number of charter schools declined since 2000–01, and in several other states, the number of charter schools increased only slightly.

Charter Schools Remain a Fraction of Total Public School Enrollment. The charter enrollment still represents a small fraction of students in most states. More than half of the charter school enrollment comes from only five states: California, Michigan, Arizona, Florida, and Ohio. Washington, D.C. has more than one-quarter of public school students who attend charter schools. However, aside from D.C. and nearby Delaware, states in the Southwest and industrial Midwest are the only areas where charter students comprise even 4% or more of public school students (see Table A-3 in Appendix). In the Midwest, charter schools might be acting as alternatives to public school districts in decaying older central cities. Yet in 22 states, 1% or less of public school students are enrolled in charters, suggesting that this reform accounts for only a small proportion of students in many states.

In many of our nation's largest metropolitan areas, the percentage of students enrolled in charter schools was at or below the national figure of 2.5%. Of the five metropolitan areas with at least one million students in 2007–08, only Los Angeles had a percentage of charter students higher than the national share. Chicago, Dallas, and New York had less.

Metropolitan areas in the industrial Midwest and Arizona and Colorado accounted for most of the metros containing the highest percentages of charter school students. Each of the three Arizona MSAs in Table A-4 has almost 1 in 10 metro students enrolled in charter schools. And across the Phoenix metro, there are an astonishing 265 charter schools, the largest number of charters in any metro. In Tucson, where the central city district has just negotiated a post-unitary plan to end judicial oversight of its desegregation efforts, nearly 90 charter schools enrolling almost 15,000 students complicate efforts to remain diverse. Those efforts will be particularly difficult if Tucson charters are disproportionately educating students from a particular racial-ethnic group or attracting students from schools that were previously diverse under the desegregation order. To the east of Tucson, the New Orleans metro had the highest percentage of charter school students, due to the influx of charter schools after the devastation of Hurricane Katrina in 2005 (Gumus-Dawes & Luce, 2010).

Charter School Students: Disproportionately Students of Color

Having documented the rapidly growing enrollment of charter school students, this analysis turns next to an examination of the racial-ethnic composition of charter schools and the patterns of concentration by race within the charter school sector. We examine these patterns at the national, state, and metropolitan area level. Just as differential racial composition between schools within a district, for example, signifies segregation, differential racial composition between charter schools and other public schools represents segregation across sectors.

The racial-ethnic composition of charter school students differed substantially from traditional public school students in 2007–08. ¹⁸ Charter schools enrolled a disproportionately high

¹⁷ We define these as "regular" schools as classified by the Common Core. That excludes alternative, vocational, and special education schools. There were 84,573 regular, traditional public schools in 2000 and only 83,560 schools in 2007.

¹⁸ All tables that describe racial-ethnic composition or segregation of students use only the students for whom race-ethnicity is reported in the CCD. As a result, the aggregate "total" is less than those reported in aggregate as "total membership" used in the enrollment section above.

percentage of Black students when compared to other public schools, and conversely a lower proportion of White students. The overrepresentation of Black students nationally is consistent with earlier trends in the charter school enrollment (see Frankenberg & Lee, 2003, p. 23). Today, the percentages of Latino, Asian, and American Indian students were relatively similar between charter and traditional public schools across the U.S.¹⁹

Table 1
Enrollment and Racial Composition of Charter and Public Schools, 2007–08

		White	Black	Latino	Asian	
	Enrollment	$(^{0}/_{0})$	$(^{0}/_{0})$	(%)	$(^{0}/_{0})$	American Indian (%)
Charter	1,193,286	39%	32%	24%	4%	1%
Public	46,283,865	56%	16%	21%	5%	1%

Source: 2007-08 NCES Common Core of Data

Just as the size of the charter school enrollment varies widely among states, so too does the racial composition of states' charter school enrollment. This pattern is indicative of racial stratification at the state level between the traditional public school sector and charter schools. Among the 29 states and D.C. with at least 5,000 charter school students, only seven have a majority of White charter students. For comparison, 40 states have a majority white enrollment among all public schools.

By contrast, *more*—12—states have a majority of charter school students who are Black (see Table A-5 in appendix). This is considerably larger than Black enrollment trends among traditional public schools, where only D.C. and Mississippi had a Black majority among regular public school students in 2007–08. D.C. is among the ten jurisdictions with black majorities of charter school students. Others such as Michigan, Louisiana, or Illinois may reflect a large number of charter schools serving some of the states' urban areas. Ironically, some of these states, like New Jersey and Ohio, require some or all of their charter schools to take affirmative steps to create racially diverse enrollments (Frankenberg & Siegel-Hawley, 2009).

The pattern for Latino students is not as extreme as for Black students. In New Mexico, the majority of charter school students are Latino, as is the case among all public school students there. Texas, however, has a majority of charter school students who are Latino, but this is not the case among traditional public schools (47% Latino).

Regional and State Variations in Charter Enrollment by Race. The racial composition of charter schools varies substantially across different regions of the country. At the aggregate national level Black students are particularly over-enrolled in charter schools in comparison to traditional public schools. Yet differences also emerge when examining these patterns at the regional and state level.

The West, which has the lowest overall percentage of White regular public school students, has the *highest* percentage of White charter school students. Conversely, there are lower percentages

¹⁹ In tables throughout this article, the percentages may not add to 100% due to rounding.

We define the regions as follows—South: Alabama, Arkansas, Florida, Georgia, Louisiana, Mississippi, North Carolina, South Carolina, Tennessee, Texas, & Virginia. Border: Delaware, District of Columbia, Kentucky, Maryland, Missouri, Oklahoma, & West Virginia. Northeast: Connecticut, Maine, Massachusetts, New Hampshire, New Jersey, New York, Pennsylvania, Rhode Island, & Vermont. Midwest: Illinois, Indiana, Iowa, Kansas, Michigan, Minnesota, Nebraska, North Dakota, Ohio, South Dakota, & Wisconsin. West: Arizona, California, Colorado, Montana, Nevada, New Mexico, Oregon, Utah, Washington, & Wyoming.

of Latino and Asian students in western charter schools than in other public schools. As a result, charter schools in the West as a region, and in some individual states and communities elsewhere, show some signs of white flight from regular public schools.

In all regions Black students are over-enrolled in charter schools as compared to their regional public school percentage. This is particularly noticeable in the Border region, which has an astonishing 74% of charter students who are Black (compared to only 20% of traditional public school students). This trend is influenced by the two jurisdictions with the largest charter enrollments, D.C. and Missouri, having large percentages of Black charter enrollments.

Black students are also substantially over-represented in charter schools in the Midwest and the Northeast. Approximately half of all charter students are Black in these two regions. By contrast, only 14% of traditional public school students are Black (see Table 2). As will be discussed below, these trends could be the result of charter schools being located in largely minority central cities in these regions, providing minority students with alternatives to the public school district. Black students in the cities of these regions tend to be heavily isolated in high poverty, segregated schools, which is a legacy of the U.S. Supreme Court's *Milliken* decision that limited city-suburban desegregation in 1974. The dissolution of desegregation plans also contributed, following the Court's 1991 *Dowell* decision pushing for termination of existing court desegregation orders. In general, the *Milliken* decision has had a major impact on schools in these regions because of very severe housing segregation for Blacks and fragmented (often homogenous) school districts in each metro (Clotfelter, 2004). Latino students in these Northeastern and Midwestern metro areas, however, do not enroll in charter schools in nearly the same rates as Black students.

Table 2
Enrollment and Racial Composition of Charter and Traditional Public Schools by Region, 2007–08

Region	% American	%	%	%	%	Number of			
	Indian	Asian	Latino	Black	White	Students			
Charter School Enrollment									
South	0%	3%	28%	33%	35%	263,993			
West	2%	5%	34%	10%	49%	447,496			
Border	1%	2%	9%	74%	15%	54,090			
Northeast	0%	2%	17%	49%	32%	143,554			
Midwest	1%	3%	8%	51%	37%	274,171			
Alaska & Hawaii	7%	46%	4%	2%	41%	9,982			
	Tradition	nal Public	School En	rollment					
South	0%	3%	22%	26%	49%	15,073,976			
West	2%	9%	39%	6%	44%	10,568,032			
Border	4%	3%	6%	20%	68%	3,426,290			
Northeast	0%	6%	15%	14%	65%	7,722,502			
Midwest	1%	3%	9%	14%	74%	9,213,246			
Alaska & Hawaii	11%	48%	5%	3%	33%	279,819			

Source: 2007–08 NCES Common Core of Data

The composition in the South is different. Latino and Black students are disproportionately enrolled in charter schools while White students are somewhat underrepresented in comparison to the regional average. Whites in the South have traditionally been less likely than whites elsewhere to enroll in private schools, though the South has always had the largest percentage of Black students

and the most integrated schools for most of the past four decades (Orfield, 2009; Reardon & Yun, 2002). Most southern states also had a very low enrollment of students in charter schools. Combined with the lower percentage of White students in charter schools, this indicates that, although White students are also a minority of all students in the South (as in the West); they are substantially less likely than western Whites to enroll in charter schools.

In most states and nationally, the charter school enrollment has a lower percentage of White students. The difference in the percentage of White students in charter and traditional public schools is substantial in some places: many of the Midwestern states, for example, have much lower percentages of White charter students than among other public schools. The percentage of White students in public schools in these states is twice that of charter schools.

This is not uniformly the pattern, however, and in ten states, the percentage of White students is higher in charter schools than in regular public schools (see Figure A-1 in Appendix). Of these ten states, nine of them are in the West, which as a region has the highest percentage of *nonwhite* students in public schools. These states (Hawaii, California, New Mexico, Nevada, Arizona, Colorado, Oregon, Utah and Idaho) are mostly at the extremes in terms of the percentage of White students among the traditional public schools: either extremely White or among the lowest percentages of White students. Charter schools in some of the most diverse states may be seen as a less diverse alternative for white students.

North Carolina is the only non-western state to have a higher percentage of White students among the charter enrollment than in traditional public schools.²¹ This is driven at least in part by considerably higher over-enrollment of White students in metropolitan Charlotte's charter schools (Table A-6 in Appendix). At one time, many districts in the state were under court-ordered or voluntarily implemented desegregation plans. Charlotte-Mecklenburg Schools have rapidly resegregated since the termination of its desegregation plan. White enrollment in charter schools may be one manifestation of this trend, although North Carolina's charter school legislation requires that charter schools' diversity be reflective of their surrounding enrollment once they have been in operation for a year. On the whole, White enrollment in southern charter schools is a stark contrast to the West, even though many of southern states also have quite diverse student enrollments.

Although Black students are substantially overrepresented in charter schools nationally, in Florida the Black percentage of charter school students is *lower* than other public schools (see Figure A-2 in Appendix). This is also true in Hawaii and Idaho, but they have very few Black students. There are many states in which the Black percentage of the state's charter school enrollment greatly exceeds that of the public school enrollment. States like New Jersey, Indiana, and New York have well over 60% of charter school students who are Black while less than 20% of traditional public school students are Black. Minnesota and Massachusetts are two states with lower percentages of Black students that also have a charter enrollment that is three times as high in terms of Black percentage among traditional public school students.

The pattern is more mixed for Latino students. In half of the states—15 with charter enrollments over 5,000—Latino students are underrepresented in the charter school enrollment compared to the regular public school enrollment (Figure A-3 in Appendix). Five of the six states with the highest percentage of Latino public school students (New Mexico, California, Arizona, Nevada, and Colorado) were each a state in which Latinos were *underrepresented* in charter schools. Texas was the exception, where Latinos comprised a higher percentage of the charter school enrollment than they did of the traditional public schools. Further, except for New Mexico, among these populous Latino states where Latinos were underenrolled in charters schools there was a

²¹ Alaska and Kansas have a disproportionately high share of white students, but only enroll just over 3,000 charter school students.

sizeable difference. Some states in the Northeast/Midwest (Massachusetts, New Jersey, Illinois, and New York) display the opposite pattern.

Metropolitan area racial composition: Replicating state and regional patterns of charter school enrollment. There are a number of metropolitan areas in which the charter school enrollment has a higher White percentage than the traditional public school enrollment. Many of these metros are in the West. All of the California metropolitan areas except for San Francisco have a higher White percentage of charter students. Similarly, metros in Arizona and Colorado also have a disproportionately high White charter school enrollment (see Table A-6 in Appendix).

Blacks are substantially overrepresented in charter schools in many other metros. Yet this is not the case in some metros with higher shares of Black students in public schools, including Miami and Atlanta. Of course, in metropolitan New Orleans and Washington, D.C.—places where we have seen high percentages of central city students enrolling in charter schools—the opposite pattern appears.

Latino patterns of enrollment in charter schools are mixed at the MSA level, with particularly low enrollment in charter schools in the region where most Latinos live. Among metros in which the Latino percentage of the charter enrollment differs substantially from the traditional public school enrollment, almost all metros outside the West had an overenrollment of Latinos in charter schools. For example, the percentage of Latinos in the Boston area's charter schools was almost twice as high as the percentage of Latinos in traditional public schools. The opposite pattern is true in almost all metros in the West, however. The exceptions are the Bay Area (California) metros. Finally, in approximately half the metros with a large number of charter schools, the enrollment of Latinos in charter schools closely approximates traditional public schools (within five percentage points).

At the metropolitan area level (among metros with at least twenty charter schools), Black students have the most extensive overenrollment in charter schools. In the top four MSAs for Black overrepresentation, the Black charter school percentage was four times as high as among traditional public schools (see Tables A-7, A-8, & A-9 in Appendix). Mirroring state patterns, Black students were overrepresented in charter schools located almost entirely in Midwestern and Northeastern metropolitan areas. Overrepresentation was less extensive for Whites and Latinos. In general, many of the metros that had higher Black overrepresentation were among those with the highest Latino overenrollment in charter schools. Metros in the West were almost exclusively the ones with highest overrepresentation for Whites in charters, particularly those in California and Arizona. By contrast, with the notable exception of the Bay Area metropolitan areas—which have recent experience with desegregation plans among their traditional public school districts, Latino overrepresentation is not present in the West's metros.

Geography of Charter Schools: Influencing Student Composition

The location of schools—charter and traditional public schools alike—has implications for the composition of the student body they enroll.²² An earlier analysis of all public schools found that percentage of students in segregated schools varied by geographic location. In particular, lower percentages of Black and Latino students who went to schools in towns or rural areas were in segregated minority schools (e.g., 90-100% students were non-white) across most regions of the country (Orfield & Frankenberg, 2008).

²² The geographic location is taken from the school's location and does not specify, for example, whether a city or suburban school might be in a separate municipal district or part of a countywide district. It would be informative for future research to explore how patterns of school geography might differ across various types of district jurisdictions.

Because school location matters so much, desegregation plans have long highlighted the "siting" of schools as a way to further integration efforts, a practice Justice Kennedy recently endorsed as one legally permissible way to voluntarily integrate schools. Charter schools arguably have an even stronger ability to foster integration since they are able in most instances to attract students regardless of district boundary lines, and they can often choose their location.

Nationally, charter school students are far more likely to attend schools located in cities, especially large cities, than traditional public school students. More than half of charter school students, in fact, attend schools in a city, almost twice as many as traditional public students. Two-fifths of charter students attend schools in *large* cities, while only one in six traditional public school students do. Earlier analyses of charter school enrollments have noted how the concentration of charter schools in urban areas skews the charter school enrollment towards having higher percentages of poor and minority students (Carnoy, et al., 2005). There are considerably lower percentages of charter schools in suburbs and town or rural areas than is the case for traditional public schools. Approximately one in four charter schools are in the suburbs, mainly in the suburbs of large cities. Less than one in five charter schools are in town or rural areas.

Table 3
Percentage of School Students by Charter Status and Location, 2007–08²³

1 creeninge	71 0011001	Tereoritage of benoof beautiful by charter battan and bounton, 2007 of							
Charter	Large	Smaller	Large	Smaller	Town/	City	Suburb	Rural	
Status	City	City	Suburb	Suburb	Rural			or	
								Town	
Charter	39%	17%	22%	3%	19%	56%	25%	19%	
Traditional	17%	13%	33%	5%	32%	30%	38%	32%	
Public									

Source: 2007–08 NCES Common Core of Data

In general, states with a lower percentage of White students have a higher percentage of students enrolled in charter schools located in urban areas (Tables A-10 and A-11 in Appendix). Eight states have four-fifths of charter students enrolled in cities, and each has less than one in three charter school students who are White. New Jersey is a notable exception to this trend, as it also has about a tenth of charter school students that are White. Unlike most other states with such a low percentage of White students, in New Jersey, only a slight majority of charter school students are in city schools, while almost an equally high share attends suburban schools. The fact that New Jersey is one of the most heavily suburban states in the U.S. may influence these trends.

Conversely, states with the highest percentage of White charter school students have lower percentages of charter students in cities—and to some extent, lower percentages in suburbs of these cities as well. In each of the five states with the highest percentage of white charter school students, at least 35% of students went to charters in rural areas or towns. Georgia and Florida are notable exceptions to these trends, however. While less than 30% of charter school students attend schools in the city, nearly half of charter school students in these states are in suburban schools. Unlike other states with a similarly low percentage of urban charter schools (e.g., North Carolina or Oregon) that have majority White charter enrollments, Georgia and Florida have less than 45% White charter students. The prevalence of countywide districts in these two states provides one possible explanation for high minority enrollment in non-urban charter schools. All school districts in Florida and many in Georgia share coterminous boundaries with their counties. As a result,

²³ The geographic distribution of charter and public schools is based on the 29 states with at least 5,000 charter students.

school districts tend to cover comparatively larger geographic areas that include both cities and suburbs, and students may be used to traveling across municipal boundaries for school. Charter schools situated within these countywide school districts might be located outside the city yet still attract a largely nonwhite student population.

In three states, North Carolina, Hawaii, and Oregon, a majority of charter school students are in rural areas. In North Carolina, particularly, the higher percentage of rural schools may explain the racial composition of charter students. North Carolina was a state in which the percentage of White charter school students was higher than the White percentage of traditional public students, and also has a fairly low percentage of charter schools located in cities (see Figures A-4 and A-5 in appendix).

Charter school legislation and state funding formulas can affect the location of charter schools in each state, by either authorizing charter schools in certain locations (e.g., certain types of districts) or by providing incentives to serve a certain demographic group. There are some states in which charter school legislation is written such that charter schools can only be established in urban areas or there is an incentive to do so. Ohio, for example, only allows for a certain type of charter school in a "challenged school district," which includes the largest urban districts in addition to a few other categories. In the last few decades, some states have adopted educational funding structures that allocate more money to educate students seen as being more difficult to educate, so that schools can provide equal educational opportunity for all students. These reforms may have an unintended consequence for charter schools. Minnesota's funding formula provides incentives for charter schools to attract urban students because of the higher reimbursement for educating such students; and, as seen above, more than 60% of Minnesota's charter schools are located in cities. Yet, in Louisiana where there has been an influx of charter schools post-Katrina, the funding formula provides more money for a school to educate a child classified as gifted than a child eligible for free or reduced lunch or classified as LEP.

The geographic skew of charter schools helps to explain some of the aggregate differences in student composition between charter and traditional public schools (see also Carnoy et al., 2005). In particular, the difference in students by poverty and race is much narrower when examining schools by geographic location. Among all schools, charter schools have a higher percentage of low-income and lower percentage of White students than traditional public schools. The difference in the percentage of poor students in either the cities or suburbs was lower than among all charter and public schools (see Table 4). Further, in towns and rural areas, charter schools actually had a *lower* percentage of low-income students than did traditional public schools. When comparing White students, charter schools in cities have an enrollment that is just seven percentage points lower than traditional public schools—which is a substantially smaller gap than the seventeen percentage points between all charter and traditional public schools (see Figure 1).

²⁴ In a number of states, lawsuits have challenged state educational funding for charter schools. In some cases, charter schools allege that they are unfairly prohibited from accessing funds for building schools while in other states, school districts try to prevent funding charter schools in their area. It is beyond the scope of this article to examine these claims except to note that these cases may impact the location of charter schools. See "Charter advocates challenge school finance systems in Arizona and North Carolina" accessed on December 7, 2009 at http://www.schoolfunding.info/news/litigation/09-10-16%20Charter%20Litigations.php3.

²⁵ P. 34, the State of Public Education in New Orleans: the 2008 report accessed on December 7, 2009 at http://www.tulane.edu/cowen_institute/documents/2008Report_000.pdf.

Table 4
FRL Percentage of Students by Geographic Location of School, 2007–08

	Charter	Traditional public	Difference
All Students	52%	44%	8%
City	62%	56%	5%
Suburb	41%	35%	6%
Town/Rural	37%	42%	-5%

Source: 2007-08 NCES Common Core of Data

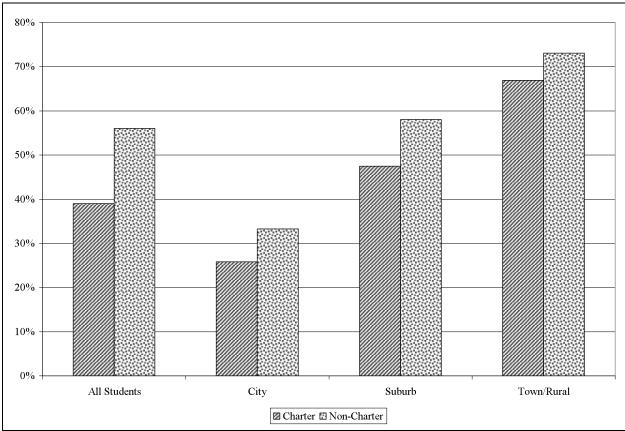


Figure 1
White Percentage, by Geographic Locale of School, 2007–08
Source: 2007–08 NCES Common Core of Data

What Types of Schools Do Charter Students Attend? Examining Racial Segregation

As seen, charter school students disproportionately enroll Black students, and, in fact, a majority of charter school students are students of color. In theory, where the percentage of students of color is higher, if students are evenly spread across all schools, we would also expect more students to be in schools with higher percentages of nonwhite students. To explore whether and how these enrollment trends play out at the school level, in this section we examine more closely the racial composition of charter schools. We measure this in several ways: concentration of

students in segregated minority schools, percentage of students in segregated white schools, and exposure of students to other racial groups. These different measures, aggregated to the national, state, and metropolitan area level, help to understand what the differential racial composition of charter schools portends for racial isolation of charter school students.

High Minority Concentration in Charter Schools

Higher percentages of charter school students of every race attend predominantly minority schools (50–100% minority students) or racially isolated minority schools (90–100% minority students) than do their same-race peers in traditional public schools. The higher levels of segregation for charter school students is particularly noticeable for Black students, who are overwhelmingly the most likely to attend racially isolated minority charter schools.

Seventy percent of Black charter school students attend 90–100% minority schools in 2007–08. Although segregation of Black students has been increasing since 1990 across the country, reaching its highest level in nearly four decades, the segregation of Black students in charter schools is much higher. Black charter school students are twice as likely as Black students in traditional public school students to be in schools with less than a tenth White students. The percentage of Black charter students in racially isolated minority schools has remained stubbornly high over the last seven years (70% of Black students in charter schools were in 90–100% minority schools in 2000–01).

Though less extreme, charter segregation has increased for Latino students since 2000. Half of Latino charter school students were in schools with 90% or more students of color by 2007–08. Further, more than half of charter students from every minority group attended predominantly minority schools. For each of these groups—Black, Latino, Asian, and American Indian—a higher percentage of students were in 50–100% minority charter schools than in predominantly minority regular public schools (see Table 5). In the case of Blacks and Latinos, more than four-fifths of charter students were in segregated minority schools. However, like their public school counterparts, Asian charter school students were the least likely of all students of color to be in segregated minority schools.

Table 5
Percentage of Charter and Public School Students in Segregated Minority Schools, by Race-Ethnicity, 2007–08

	Charter			Public			
	50-100%	90-100%	99-100%	50-100%	90-100%	99-100%	
	Minority	Minority	Minority	Minority	Minority	Minority	
White	19%	2%	0%	13%	1%	0%	
Black	89%	70%	43%	72%	36%	15%	
Latino	83%	50%	20%	77%	38%	9%	
Asian	60%	23%	9%	55%	15%	1%	
American Indian	61%	31%	11%	49%	20%	9%	
All Students	58%	36%	19%	38%	15%	4%	

Source: 2007-08 NCES Common Core of Data

Many charter students attended schools where 99% or more of the students were minority. More than two-fifths of Black charter school students attended such extremely segregated minority schools, a percentage which was, by far, the highest of any other racial group, and nearly *three times* as high as Black students in traditional public schools. Latino charter students were more than twice as likely to be in these almost totally segregated minority schools. Asian and American Indian students

were also more considerably likely to attend virtually all-minority charter schools than were their same race peers in traditional public schools.

Minority charter school students attend schools of minority concentration at disproportionately high levels in many states. A majority of states report at least half of their Black or Latino charter students in intensely segregated minority schools. This pattern of differential rates of attending segregated charter schools holds across states regardless of their minority percentage in charters.

Of the 40 states and D.C. with charter schools, 22 have majorities of Black charter school students in 90–100% minority schools (see Table A-12 in Appendix). In comparison, only five states have majorities of Black students in traditional public schools of such intense minority concentration. Aside from D.C., the highest percentage of Black students in traditional, intensely segregated minority public schools is just over 60%. Fifteen states (among those states with at least 5,000 charter students) have more than two-thirds of Black charter students in such segregated schools. Four states and D.C. had at least 9 out of 10 Black charter school students attending intensely segregated schools in 2007–08.

This pattern of higher Black concentration in charter schools bears out across *every* state in which the charter school enrollment has a higher percentage of White students.²⁶ Yet, as a result of the higher percentage of White students, one might expect lower shares of students in segregated minority schools. Looking at the states that have at least 5,000 charter school students, this is not the case for Black students in *any* state (the pattern is true for Latino students in four of these states).²⁷ For each of the ten states with a higher percentage of White students in charter schools than in traditional public schools (e.g., a positive charter-public difference in Table A-12), there was the same or higher percentage of Black students in intensely segregated minority charter schools than among other Black students. California is an example of a state where white students are a higher percentage of the charter school enrollment than among the traditional public school enrollment, where Black students account for only about 1 in 14 students, yet the segregation of Black students is *higher* in charter schools. This trend is even displayed in states that have a large percentage of White students—35% of Oregon's Black charter students are in segregated minority schools, even as the vast majority of state charter school students are White (83%).

Delaware was long one of the nation's least segregated states for Black students due to a massive city-suburban plan that covered metro Wilmington. Today the state is an example of how charter schools are threatening the lingering effects of integration plans after the court order was dropped. The state's charter schools are far more segregated than its regular public schools.

Delaware had a well-known desegregation case that went to the Supreme Court in 1980 (see Orfield & Lee, 2004). It consolidated all school districts in the state into one and then split it into four pie-shaped districts to remedy metropolitan segregation.²⁸ Despite a relatively high percentage of students of color in traditional public schools, Delaware had remarkably low percentages of Black and Latino traditional public school students in intensely segregated minority schools, 3% and 5%, respectively, even after the end of the court-ordered desegregation case in 1996. Yet, in charter schools in the state, White students comprised nearly half of the charter school enrollment, and two-thirds of Black charter school students and almost one-third of Latino charter students are in

²⁶ This is not uniformly true among states where the charter school enrollment is less than 5,000 (see Table A-12). Some of these states have extremely small charter enrollments, representing no more than a handful of schools, and trends among these states should be judged with caution—yet also monitored if these enrollments begin to expand.

²⁷ Idaho has no Black students in segregated minority schools.

²⁸ Delaware's charter legislation as adopted in 1995 only specifies that charters can not be established to circumvent desegregation orders—which is no longer applicable since it was declared unitary in 1996.

intensely segregated minority schools. Recall from above that charter school students comprised 7.4% of the entire public school enrollment in Delaware. Although charter students were a fraction of the enrollment, their high levels of minority segregation are mitigating the successful remnants of more widespread desegregation efforts in the state.

An intriguing dimension of this higher segregation of Black students in charter schools was the extent to which this is usually *not* the case for Latino charter school students. Taking Oregon as an example again, while there was a substantial share of Black charter students in segregated schools—much more than among Black traditional public school students despite the differences in White percentage of students in these two sectors—only 1% of Latino charter school students were similarly segregated, the same as among traditional public schools. In California and Nevada, Latino segregation rates were slightly lower in charter schools than in public schools (a difference of three percentage points). On the other hand, Latino charter school students in North Carolina experience similarly very high levels of segregation in high minority schools as Black charter school students, both at rates several times higher than their same-race peers in traditional public schools.

At the state level, while less extensive than for Black charter students, Latino charter school students are also more heavily concentrated in segregated minority schools than are their traditional public school peers. Majorities of Latino charter school students are in segregated minority schools in 11 states, which is nearly three times the number of states with such Latino segregation levels among traditional public schools (Table A-12). These eleven states, except for California, with a majority of Latino students in segregated minority schools have a disproportionately nonwhite charter school enrollment. Yet, of the nine larger states (charter enrollment at least 5,000) with half or more of Latino charter school students in segregated schools, three states had at least 35% White students among their charter enrollment (California, Minnesota, and Pennsylvania), which makes these high shares of Latino segregation surprising. There were other states with similarly high percentages of White students but lower shares of Latino segregation (e.g., Florida, Georgia, and Ohio).

Reflecting national and state trends, in most metropolitan areas, higher percentages of charter students were attending segregated minority schools than metro students in traditional public schools. There were exceptions to these trends among some metropolitan areas in California and Arizona. In a few of these metros, such as Fresno and Los Angeles, the White percentage of charter school students was higher than among traditional public school students, and might explain why fewer charter students in these metros are enrolled in segregated minority schools (see Table A-13 in Appendix). The same was also true in Tucson, where the public schools were under a desegregation plan in 2007-08. In three Deep South metros—including two where the percentage of white students in public schools was higher than in charter schools—there was also a higher percentage of traditional public school students attending segregated minority schools. Both Atlanta and Miami metros are places where desegregation plans have long since ended. Perhaps the trend is indicative of Atlanta and Miami's charter schools serving as havens for students trying to avoid segregation among traditional metro public schools.

According to earlier legal standards, the patterns of segregation described here resulting from the operation of charter schools in a number of states would raise serious questions. By the mid-1970s, many courts found the operation of school choice systems with public funds that systematically increased segregation to be a constitutional violation. In northern desegregation decisions, such as Boston, Cleveland, Indianapolis, and Minneapolis, allowing open enrollment or transfer policies that permitted Whites to transfer from predominantly Black schools instead of creating substantially desegregated schools was determined to be illegal discrimination (Orfield, 1978, pp. 20-22). Finally, in the Supreme Court's 1972 *Emporia* decision, the creation of a new school district was prohibited if it would have the effect of exacerbating segregation efforts. The

Court, in that case, said it was the effect of the creation of the district, not the intent, that was the standard by which to judge such actions. Charter schools are often a new local educational agency, or the equivalent of a new district, and they very often add to segregation.

Pockets of White concentration in charter schools. White charter school segregation is less extreme and comparatively lower than for public schools. Yet, when we also examine white segregation at the state and metropolitan area levels, we find higher white segregation in some areas.

More than 20% of traditional public school students were in a racially isolated white school (those which were 90–100% white), while only 7% of charter school students attended White segregated schools. Lower percentages of charter school students from every race attended racially isolated White schools than did traditional public school students in 2007-08. One in six White charter school students attended a school where less than one-tenth of students were nonwhite. More than double the share of White traditional public school students were in similarly segregated White schools. Among charter school students, Blacks students were the least likely to attend overwhelmingly White schools (0.4% of Black charter school students).

There are far lower percentages of students attending virtually all-white schools compared to those attending all-minority schools, regardless of school's charter status. Not surprisingly, with the lower percentage of White charter students than traditional public schools, there is a lower share of charter students in these nearly all-White schools (0.8%) than among other public schools (2.8%).

Table 6
Percentage of Charter and Public School Students in Segregated White Schools, by Race-Ethnicity, 2007-08

	Cha	ırter	Public			
	90-100% White	99-100% White	90-100% White	99-100% White		
White	16%	1%	35%	3%		
Black	0%	0%	2%	0%		
Latino	1%	0%	2%	0%		
Asian	2%	0%	5%	0%		
American Indian	3%	0%	7%	0%		
All Students	7%	0%	21%	2%		

Source: 2007-08 NCES Common Core of Data

As shown in Table A-14 in Appendix, in four states a majority of White charter students attended intensely segregated White schools, though most of the states in question were states with fewer than 5,000 charter school students. In some cases, like Idaho, charter school students across all races attend schools of white isolation: Majorities of students of all races are in 90–100% White charter schools. Yet, in other states like Arkansas, the percentage of students in segregated White schools varies substantially by race.

Nine states with significant charter school enrollment have a higher percentage of White charter students in segregated White schools than among traditional public schools (as do an additional three states where the charter enrollment was less than 5,000 students in 2007-08). In general, most of these states are those with a higher percentage of White students in the charter school enrollment than among traditional public schools. In approximately one-quarter of the states with the largest charter enrollment, either Black or Latino students (or both) are more likely to be in segregated White charter schools than segregated White public schools.

Regional differences in segregated White schools are also apparent. While many Midwestern states have high percentages of White students in segregated White, traditional public schools in

comparison to Black or Latino students, this is much less often the case for White students in charter schools. In states like Ohio or Pennsylvania, the percentage of White charter school students in segregated White schools is several times lower than that of White traditional public school students. Of course, these states, as mentioned above, also have large gaps in the percentage of White students in these sectors, namely that the state charter school enrollment has a considerably lower percentage of white students than is the case among traditional public schools.

By contrast, in parts of the South and Southwest regions, white segregation is similar—generally low—across both charter and traditional public schools for White students. Recall from above that charter schools in the West have a higher percentage of White students than do traditional public schools. These White charter students in several western states are also more likely to be in segregated White schools (see Table A-14 in appendix). Likewise, there are a few states in the South in which White segregation is higher among charter school students. In Florida and North Carolina, for example, the percentage of White charter school students in segregated White schools is higher than among traditional public schools. A higher percentage of White charter students—one in five—attends segregated White schools than among the rest of North Carolina's public schools. Paired with the minority segregation rates above, these tables suggest that substantial percentages of North Carolina charter school students attend segregated schools on both ends of the spectrum.

In most metropolitan areas, the percentage of charter students in segregated White schools is relatively low. Metropolitan Portland had the highest percentage of charter students in segregated White schools—nearly 30% (see Table A-15 in Appendix). Although White students are usually underrepresented in charter schools, in several metropolitan areas, the percentage of charter students in segregated white schools is *higher* than among traditional public schools. Two of the metros with higher shares of charter school students in segregated White schools were in Florida. One of these, Orlando, had lower minority segregation among charter schools, but in Tampa, charter schools appear to have higher White and higher minority segregation than in traditional public schools.

In contrast to the geographic trends in enrollment of White and low-income students seen above, the difference of minority segregation across all locales is relatively similar to that within cities. More than half of charter schools in city locations had at least 90% students of color in 2007–08, which signified considerably higher segregation than among traditional urban public schools (see Table 7). The differences in minority segregation were less extreme for students attending schools in other locations, but, in each type of geographic location, higher percentages of charter school students attended schools with few White students.

Table 7
Percent of Students in 90-100% Minority Schools, by Charter Status and Locale, 2007–08

		/TI 10.0 1.D 1.10	Dicc
	Charter	Traditional Public	Difference
All Students	36%	16%	20%
City	52%	34%	18%
Suburb	23%	13%	10%
Town/Rural	6%	5%	2%

Source: 2007-08 NCES Common Core of Data

Interestingly, when comparing the extent of White segregated schools by geography, in urban areas a slightly higher percentage of charter school students than traditional public school students attend segregated *White* schools (Table 8). This occurs even though overall the percentage of charter school students attending White segregated schools is much lower than among traditional

public schools. Such an unexpected finding—particularly in contrast to other geographies and overall—should be investigated further to understand what types of traditional public schools students may be opting not to attend. White isolation remains high for both charter and traditional public school students in town and rural areas. The higher White segregation among traditional public schools may be due, in part, to the fact that a higher percentage of public schools are located in these less dense areas.

Table 8
Percent of Students in 90–100% White Schools, by Charter Status and Locale, 2007–08

	Charter	Traditional Public	Difference ²⁹
All Students	7%	21%	-14%
City	3%	2%	0%
Suburb	6%	17%	-11%
Town/Rural	19%	39%	-20%

Source: 2007–08 NCES Common Core of Data

Interracial Exposure of Charter School Students

With the growing multiracial composition of the student enrollment, the nature of segregation and integration is complex. Having seen above higher levels of minority concentration for charter school students of all races and at the same time, pockets of White isolation, we now consider the exposure of charter school students to their own race and to others. The extent of cross-racial student exposure is measured using the exposure index, which is a weighted average describing the racial composition of a "typical" student's school. Exposure of one racial group to itself is also referred to as "isolation". If students were perfectly integrated, the exposure to a group would be equal to the group's share of students. For example, Latinos comprise 24% of charter students, so theoretically under this scenario of perfect integration—albeit with no geographic constraints—other racial groups would attend charter schools where Latinos made up 24% of the population. After first examining the interracial exposure of the five racial-ethnic groups across all charter and traditional public schools in 2007–08, this study examines interracial exposure for White, Black, and Latino students more extensively at the state level.

Mixed patterns of charter school isolation: Lower isolation for Whites, higher isolation for minority students. White students in traditional public schools have long been the most isolated of any racial-ethnic group, but our analysis finds that among charter schools, Black students are more isolated than White students are. This is one of several striking trends when looking at the exposure of charter students to students of other races and, conversely, isolation with students of their own race. Nearly three out of four students in the typical Black student's charter school are also Black. This indicates extremely high levels of isolation, particularly given the fact that Black students comprise less than one-third of charter students. Latino isolation is also high, but not as severe as for Blacks or Whites across all charter schools.

Second, the exposure to White students is lower for *each* racial-ethnic group in charter schools than it is for their peers in traditional public schools. This is particularly true for Black students, who have the lowest exposure to White students among all charter students. Only one in seven students in the typical Black charter school student's school is White (Table 9), about half the share for Black traditional public school students (see Table A-16 in Appendix). Meanwhile, White

²⁹ Numbers may not total due to rounding.

charter school students have, on average, five times as many White students in their schools than do Black charter school students. In the midst of these concerning patterns, one positive trend is that, across all schools, White students have more exposure to Black and Latino students in charters than in other public schools, although we will see below that this varies by state.

In contrast to White and Black students, the isolation of Latino and Asian students is roughly the same regardless of whether the student attends charter or traditional public schools, albeit each is slightly more isolated in charter schools. The isolation of these groups of students in charter schools has grown since 2000. Further, while Latino and Asian students have lower exposure to White students in charter schools, they also have somewhat higher exposure to Black students than in traditional public schools. These trends may indicate that some charter schools offer the promise of providing their students with multiracial learning environments, or schools in which at least three racial groups are a tenth of the student enrollment. This might be particularly more likely for White students in charter schools than in traditional public schools, where they are the least likely to be in multiracial schools of any other racial-ethnic group (see Orfield, 2009).

Table 9
Racial Composition of Schools of the Average Charter School Student, by Race-Ethnicity, 2007–08

	Racial Composition of Charter School Attended by Average						
Percent Race in Each	White	Black	Latino	Asian	American		
School	Student	Student	Student	Student	Indian Student		
% White	70	14	22	41	39		
% Black	11	73	16	14	9		
% Latino	13	12	58	20	18		
% Asian	4	2	3	24	3		
% American Indian	1	0.3	1	1	31		
Total	99	101.3	100	100	100		

Source: 2007–08 NCES Common Core of Data; Note: Totals may not add to 100 due to rounding.

Though White students in both regular public schools and charter schools, on average, attended schools in which at least 7 out of 10 students were White, the percentage of nonwhite classmates was slightly higher in charters, perhaps reflecting their large nonwhite enrollments in a number of states. Yet, these patterns of interracial exposure do not hold uniformly across all states. Of the 29 states and D.C. that had at least 5,000 charter school students, twelve states had lower exposure to students of other races (e.g., higher isolation) for White charter school students than was the case for White public school students (see Table A-17 in appendix). Most of these states are those in which the percentage of White students in charters exceeds the percentage of White students in traditional public schools, but this is not the case everywhere. Delaware is an exception, where the percentage of White charter school students was lower than White public school students, yet the White isolation of charter students was substantially higher than that of traditional public school students (73 and 59, respectively). Further, in other states like North Carolina, while the percentage of White students in charter schools was slightly higher than the percentage in traditional public schools (a difference of four percentage points), the difference in White isolation was much higher. White charter school students in North Carolina attended schools where 80% of students, on average, were White. This was 11 percentage points higher than among traditional public schools. In every state, the exposure of White charter students to other White students equaled or exceeded—often by large margins—the percentage of charter students in the state that were White.³⁰ (Theoretically, if there were no segregation, White exposure to other White students would equal the percentage of White students in charter schools.) There are rather large gaps between the White percentage and isolation in some of the Northeast and Midwestern states, which often have low percentages of White charter school students. Michigan, one of the states with the largest number of charter students, has a 41 percentage point disparity between the percentage of White charter students (34) and the White isolation of charter students (75). New Jersey is a state in which charter school legislation requires schools to seek diversity in its charter schools. Despite only enrolling 9% of charter school students who were White, the typical White charter school student in New Jersey attended a school with nearly a majority of White students.

To more fully understand this interplay of White isolation and exposure to students of other races, we return again to the examples of Delaware and North Carolina. Delaware has a higher percentage of Black students in charter schools (41%) than among traditional public schools (33%). Theoretically, if students were evenly distributed, all charter school students would have higher exposure to Black students than would traditional public school students. As discussed above, White charter school students have higher exposure to *White* students (or isolation) than their peers in other public schools in Delaware. Further, the typical White charter school student in Delaware has just over half the percentage of Black students in their school (16%) as does the typical traditional public White student (28%). A similar pattern is seen in North Carolina where, despite a higher percentage of Black students in charter schools than in traditional public schools, White exposure to Black students is lower in charter schools.

The lower exposure of Whites to Latinos in charter schools of 13 states (in comparison to exposure in traditional public schools) is one manifestation of the lower percentage of Latinos in charter schools in almost all of these states. Earlier we saw that Latinos were underrepresented in charter schools in 15 states with larger charter school enrollments, especially concentrated in the western region. Except for Minnesota, each of the states in which White exposure to Latinos was lower in charter schools than in traditional public schools was a state with a lower percentage of Latinos in charter schools than in traditional schools.

Interracial exposure of minority charter school students. Nationally, Black isolation was substantially higher among charter school students than in other public schools in 2007–08, and this trend was reflected in the vast majority of states with charter schools. Among all states with charter schools, 33 states had higher Black isolation among charter school students than among traditional public school students (Table A-18 in Appendix). Among the states with the largest charter enrollment (at least 5,000), there were only two states in which the Black isolation in charter schools was lower than that in public schools, and both of these states had very small percentages of Black students in charter schools: Hawaii (2%) and Idaho (3%). 31

Some states have higher Black isolation in charter schools because they have disproportionately higher percentages of Black students in charter schools than in traditional public schools. Many of the Midwestern states like Indiana and Minnesota are examples of this. Sunbelt states like Nevada, Texas, and Florida are also states with considerably higher Black isolation for students in charter schools compared to those in other public schools. While the percentage of Black students in charter schools is 12 points higher than other public school students in Nevada, the isolation of Black charter school students (the typical black charter student attends a school where nearly two in three students are also black) is 46 points higher than traditional public school

³⁰ The same pattern is also the case among traditional public schools.

³¹ Similar patterns hold in states with less than 5,000 charter school students. See table A-18 in Appendix.

students. Yet, Florida has a lower percentage of Black students in charter schools than in other types of public schools, and Black charter school students there also have higher levels of isolation than do traditional public school students. (Latino isolation in Florida's charter schools is also higher than in traditional public schools.)

Differences in exposure also exist by race of charter students (see Table A-18 in Appendix). While above we saw that, for example, in Delaware, White charter school students' exposure to Black students was only half that of White students in other public schools, the reverse pattern is true for Black charter school students. The isolation of Black charter school students (75%) was nearly double the traditional public school students (39%), representing very different levels of isolation with one's own group. There's a similar, if smaller, gap for North Carolina's Black students.

Fewer states had higher Latino isolation in charter schools than in traditional public schools: 14, including 12 states with a charter enrollment of at least 5,000 students (see Table A-18 in Appendix). Further, most—though not all—of the differences in Latino exposure between charter and traditional public school sectors are less extreme than for Black students. Some of the largest differences tend to be in Midwestern states, where Latino charter school students represent a slightly higher percentage of the charter enrollment than among traditional public students. In Minnesota, for example, Latino students comprise eight percent of charter school students, but the typical Latino charter student attends a school where nearly half of students are Latino, indicating much higher than expected shares of students of their own race—and considerably higher isolation than other Latino public school students in Minnesota experience.

Texas educates the second highest number of Latino students of any state in the country, nearly 2.2 million in 2007-08. Latinos comprise a lower percentage of traditional public schools, and Latinos are more isolated in charter schools where only one in four students is not Latino. The difference is relatively small, mainly because both charters and traditional public schools in Texas demonstrate high Latino isolation, but these trends are of concern due to the large numbers of Latino students they enroll and educate. By contrast, in Maryland, charter school students have a lower percentage of Latino students than do other public schools, but the isolation of Latino students is higher, many times higher than the percentage of Latino charter students (6%).

We turn to another measure of integration, specifically minority students' exposure to White students. Because we've seen above the differences in Black and Latino students' exposure to their own race (e.g., isolation) in charter schools, we examine their exposure to White students separately. Above we saw that both Black and Latino students had lower exposure to White students in charter schools than traditional public schools; the difference for Black students was particularly stark.

Black students' exposure to Whites is higher in public schools than in charter schools in most states. Eight states—including three states with more than 5,000 charter school students—have the opposite pattern: Black-White exposure is higher in charter schools than in other public schools (see Table A-19 in Appendix). The three states with large enrollments where this holds true are all states in which there are relatively few Black students (the highest was 7% of charter students in Arizona). Black charter students in most states have lower exposure to whites than do Latino charter students; the four states where this is not the case each had a low percentage of Black students.

More states (18) have higher Latino exposure to Whites in charter schools (as compared to traditional public schools), although this is only the case among 12 states with charter enrollments of at least 5,000 students. Among the states with larger charter enrollments, many of these are states in the West where, recall from earlier, Latinos in charter schools were underrepresented at the state-level in comparison to their share of the traditional public school enrollment. These patterns suggest that, though Latinos may not be enrolled in charter schools to the same extent as other public schools, Latino students in charter schools attend more integrated settings.

In most cases, Black and Latino exposure to Whites in charter schools was lower—and sometimes, much lower—than the percentage of White charter school students, which is significant given trends described earlier of lower shares of White students in charter schools. In Pennsylvania, 43% of charter school students were White, considerably lower than the share of White students in traditional public schools (76%). If Black, Latino, and White students were perfectly integrated across Pennsylvania's charter schools and Black and Latino students' exposure to White students was 43%, this would still represent substantial segregation. However, as seen in Table A-19, Black and Latino students have lower exposure to Whites than Whites' share of the charter enrollment. These relatively low levels of exposure to White students are indicative of stratification both between charter and traditional public schools and segregation within the charter school sector.

There are seven states and D.C. in which Latino charter school students attend schools that typically have a higher percentage of White students than the share of White students among charter schools statewide. In Maryland, for example, the typical Latino student goes to a school with nearly one-quarter White students, even though White students only comprise 14% of charter school students. In no state, however, was the exposure of Black charter school students to Whites higher than the percentage of White charter students.

Do Charter Schools Equitably Serve Students from Different Socioeconomic Backgrounds?

Mixed Pattern of Charter Schools Enrolling Low-Income Students

One of the most important equity questions in thinking about charter schools is whether or not low-income students have equitable access to these schools. Charter schools receive public funding, and therefore should be equally available to all students regardless of background. We have discussed above that schools of choice, like charter schools, can lead to higher stratification. Unlike some other types of choice plans, however, charter schools do not always provide transportation for students. The earlier patterns by race demonstrate that black students enroll in charter schools at a disproportionately high number and with higher levels of segregation.

Data about many of the charter schools that low-income students may get access to are so severely flawed that no part of this question can be answered with any certainty. Although almost all regular public schools in the NCES Common Core dataset report data on free and reduced lunch, which is publicly available information, an extraordinary one-fourth of charter schools do not. Further, there is no way, from the existing federal data, to know whether or not this is simply because they have not reported this important data or because they do not offer free lunch programs, which would, of course, be a major barrier for poor families to send their children to charter schools.

We classify schools into three categories based on the value reported for number of free and reduced price lunch students: "missing", "0" if the school reported 0 FRL students, or "at least 1" if the school reported a value of 1 or more students receiving FRL. For the first two categories of schools, it is unclear if students could receive a free lunch at the school. As a result, more than 330,000 charter school students attended schools where there is no evidence of any free or reduced lunch.³³ Since the requirement for receiving free lunch is proof that families cannot afford to provide it, lack of a program would be a severe social class barrier.

³² Of course, black and Latino non-charter public school students also have exposure to whites, 32% and 41%, respectively, that is lower than the share of white students (76%).

³³ One of the reasons traditionally cited as to the lower percentage of charter schools reporting free/reduced lunch data are the administrative burdens of reporting and tracking students. However, the National School

Table 10
Percentage of Charter and Traditional Public Schools, by Categories of Reporting Data about Low-Income Students, 2007–08

Charter Status	Status of School's FRL Data	Percentage of students
Traditional Public	0	1.2%
Traditional Public	At least 1 FRL student	93.3%
Traditional Public	Missing	5.5%
Charter	0	2.7%
Charter	At least 1 FRL student	72.8%
Charter	Missing	24.5%

Source: 2007-08 NCES Common Core of Data

We obtained further data from the 2007–08 federal Schools and Staffing Survey, which is a sample representative of all schools. In this survey, schools are asked if they participate in the National School Lunch Program, which is the federal government's program that provides free or reduced-price lunches to low-income students. Lower percentages of charter schools provide free or reduced price lunch (Table 11). More than one in five charter schools in this sample do not offer the School Lunch Program while only 1.5% of traditional public schools do not.

What's more, the demographic profiles of the students attending schools with and without the School Lunch Program are quite different. Charter schools without the School Lunch Program have a remarkably similar racial composition to traditional public schools. The percentage of White students in charter schools without the School Lunch Program is nearly twice that of White students in charter schools that do offer the School Lunch Program. Those charters that offer the School Lunch Program not only have a much higher percentage of students of color—58% are Black and Hispanic—but nearly 60% of students receive free or reduced-price lunches, which is considerably higher than the traditional public schools that offer the School Lunch Program.

Table 11
Enrollment of Schools by Charter and National School Lunch Program (NSLP) Status, 2007–08

	Percent	Number	Enrollment	%	%	%	0/0	0/0
		of Schools		FRL	White	Black	Asian	Latino
			Charter Sch	nool				
With NSLP	79.2%	156	67,842	58%	36%	34%	5%	24%
Without	20.8%	41	13,603	0%	69%	8%	3%	17%
NSLP								
		Т	Traditional Publ	ic Schoo	ol			
With NSLP	98.5%	6,631	4,503,098	39%	63%	15%	4%	15%
Without	1.5%	104	42,467	0%	73%	7%	9%	9%
NSLP								

Source: Schools and Staffing Survey Data, 2007–08; Note: includes schools labeled as regular or with special program emphasis.

Lunch Program offers an option for schools to serve free lunch to all students, and the Department of Agriculture only requires them to submit paperwork estimating the number of low-income students every four years. This could greatly reduce any compliance burden for charter schools (Frankenberg & Siegel-Hawley, 2009).

As seen in SASS data, among charter schools that do offer the School Lunch Program, a higher percentage of students are eligible for the program than among traditional public schools, which raises the question of whether a higher percentage of charter school students are low-income. Overall, according to CCD, charter schools enroll less than half a million low-income students, while traditional public schools enroll more than 19 million.

We explore the percentage of low-income students in two different ways here, both of which have limits. First, we calculate the percentage of low-income students across all schools: schools reporting "missing" for the value of FRL students, 0 FRL students, or 1 or more FRL students. Among all schools, traditional public schools enroll a higher percentage of low-income students (41%) than among charter schools (38%). This method of calculating low-income percentage is less than conclusive since it is likely that the count of FRL students would be higher if we knew the precise number of FRL students in those schools reporting "missing". This may be particularly true for charter schools, where one-quarter of schools had missing FRL data.

Table 12 Percentage of Low-Income Students in All Schools, 2007–08

	Enrollment	Number of Low- Income Students	% of Low- Income Students
Charter	1,207,450	457,027	38%
Traditional Public	46,773,692	19,042,282	41%

Source: 2007-08 NCES Common Core of Data

Second, we calculate the percentage of poor students using data only from those schools that reported at least one student who had free or reduced lunch.³⁴ It also excludes schools reporting missing, which we saw above included a disproportionately high number of charter schools (367). When we use this sub-sample of schools, we get a different picture of how the socioeconomic status of charter students compares to traditional public school students. In this smaller group of charter schools, more than half of students are from low-income families, while traditional public schools enroll a lower percentage of low-income students. The fact that these two different methods lead to differing conclusions about the comparative socioeconomic status composition of students in charter and traditional public schools—and the inability to ascertain which estimate is more accurate—is indicative of a major need to improve data reporting in order to understand the ability of low-income students to access charter schools.

*Table 13*Percentage of Low-Income Students (in Schools Reporting at Least One FRL Student), 2007–08

		Number of Low-	% of Low-
	Enrollment	Income Students	Income Students
Charter	878,510	457,027	52%
Traditional Public	43,621,372	19,042,282	44%

Source: 2007–08 NCES Common Core of Data

In some states, the large percentage of charter schools reporting "missing" for the number of free or reduced price lunch students results in vastly different calculations of low-income students

³⁴ This excludes those schools that may legitimately have no eligible students but also excludes those that do not offer the School Lunch Program.

among the state's charter school enrollment (see Table A-20 in Appendix).³⁵ In North Carolina and Louisiana, the reported numbers of students eligible for free or reduced lunch are only a fraction of the total charter school students. However, when calculating the low-income percentage including only schools reporting at least one FRL eligible student, a majority of charter school students are classified as low-income. There is a similar gap in D.C. and Pennsylvania charter schools. Discrepancies also exist statewide depending on whether the low-income percentage is calculated including schools that reported no charter school students (which may be schools enrolling no low-income students or those that may not offer the School Lunch Program). The low-income percentage for states like Idaho, Oregon, and Alaska differed by at least 10 percentage points in these different scenarios. In other words, our lack of complete data leads to very different conclusions as to the extent of enrolling low-income students in charter schools in a number of states.

For the remainder of this article, any tables contained in the main text will be using the subset of schools that we know for sure offer the National School Lunch Program (e.g., those reporting at least one FRL student). However, tables in the appendix also include schools reporting no FRL students.

The current method of reporting of free or reduced lunch data also makes it difficult to compare at the state-level the enrollment of low-income students in charter schools as compared to other public schools. Thirteen states with at least 5,000 charter school students had at least one-tenth of charter students attending schools not reporting FRL data (see Table A-21 in Appendix). In North Carolina, for example, only 26% of charter schools reported at least one FRL student. Overall, 367 schools reported missing data, nearly half of them in Arizona, a state with one of the larger charter school enrollments.

In a dozen states, the percentage of low-income students in charter schools is less than the share of poor students in traditional public schools. A number of these states are also states in which white students were overenrolled in charter schools. Additionally, several southern or border states had lower enrollment of low-income students, such as Florida, Georgia, and South Carolina. In other states, by contrast, the percentage of low-income students among charter schools is considerably higher than among traditional public schools. These comparisons, however, should be interpreted cautiously due to the extent of missing data.

By contrast, in a handful of states we can be confident of our comparison of the extent to which low-income students enroll in charter schools because all schools in these states report low-income data. Among states in which all charter and traditional public schools report Free or Reduced Price lunch data, charter schools in most states enroll a higher percentage of low-income students than do traditional public schools. In some states, this discrepancy is large, although that could be due in part to where charter schools are located in these states. In Kansas and Mississippi, both of which have small charter school enrollments, lower percentages of FRL students were in charter schools than was the case in traditional public schools.

Relationship of Missing FRL data and Charter School Racial Composition. A disturbing pattern of racial isolation emerges when comparing the racial composition of charter schools that report FRL students and those that do not. Heavily White charter schools may not be offering free lunches or enrolling any poor kids. The general pattern among schools is that higher percentages of students attending schools without FRL data are in schools of White segregation, whereas there are higher percentages of students attending segregated minority schools among charters that do report FRL data. Across all states, the percentage of segregated White charter schools is twice as high among

³⁵ Ohio did not report FRL data for charter or traditional public schools in 2007-08 and is excluded from discussion.

those not reporting FRL data compared to those that do, while the reverse relationship is seen for segregated minority schools. While the currently available federal data make it impossible to draw any conclusions, they strongly suggest that many charter schools not offering the School Lunch Program are those that enroll few minority students.

Eight states (among the 29 in which there is at least one school not reporting FRL data) have more charter school students in schools not reporting FRL data than in charter schools that do (yellow columns in Table A-22 in Appendix). In three states, the only segregated White charter schools are those in which the school does not report FRL data (Georgia, North Carolina, and Oklahoma). In Oklahoma, nearly one-tenth of the more then 75,000 charter school students who attend schools reporting missing data are also in schools that have at least 90% of students who are white (see Figure A-6 in Appendix). An even higher percentage of students in schools not reporting FRL data were in segregated White schools in North Carolina, 18%.

Further, in an additional 15 states (added to the eight states described above), there were a disproportionately higher percentage of students in charters without FRL in segregated White schools than among charter schools reporting FRL data (gray columns in Table A-22). In Michigan, for example, nearly 60% of students in schools with no evidence of a School Lunch Program were in segregated White schools. By contrast, only 9% of Michigan charter schools that have at least one FRL student were also schools of White segregation. Particularly large discrepancies also existed in Minnesota and Oregon.

On the other end of the spectrum, there were a higher percentage of students in segregated minority schools among charter schools reporting FRL data (Table A-22). For example, in 17 states, there are segregated minority schools among charters reporting FRL data but not among those charter schools not reporting FRL data. States like California, Michigan, and Pennsylvania have considerably higher percentages of students in segregated minority schools among those charter schools with evidence of the School Lunch Program than among those charter schools that do not. In fact, this relationship is so consistent that only five states run counter to this trend, containing a higher percentage of students in segregated minority schools among charters missing FRL data.³⁶

The overlap of racial segregation and evidence of a school lunch program affects thousands of charter schools in a number of states. In seven states, at least 1,000 students in each state attend charter schools of intense White segregation and with no evidence of reduced or free lunch being offered (Figure A-7 in Appendix). In states like Oklahoma and North Carolina, thousands of students attend such schools and none attend intensely segregated White schools offering the school lunch program. In other states like Oregon, Arizona, and Idaho, the number of students attending intensely segregated White charter schools without any free or reduced price lunch students exceeded the number of students in similarly segregated White charter schools that did enroll low-income students.

Charter schools: More widespread concentration of low-income students.³⁷ The extent to which charter schools serve low-income students is an important civil rights concern, and another vital consideration is the extent to which low-income students are concentrated in certain charter schools. Having seen above the serious concern about the accuracy with which charter schools report free or reduced lunch data—the only publicly available measure of student poverty—we now turn to an

³⁶ They are HI, IL, NY, OK, and SC. In several of these states, there may be only one charter school missing FRL data.

³⁷ In examining poverty concentration here, we use the subset of charter and traditional public schools that report at least one FRL student. Tables A-23, A-24, & A-25 in appendix include schools reporting "0" FRL students

examination of poverty concentration in charter schools. Due to the incomplete nature of low-income data in many states, this analysis aggregates data to the national level.

When comparing the percentage of students by poverty concentration, higher percentages of charter school students are in schools with extreme concentrations of student poverty (76–100%). More than one in four charter school students attended a school where at least three-quarters of students were from low-income households. A considerably lower share of students in traditional public schools attended such high poverty schools (16%). Conversely, lower percentages of charter students were in the lowest-poverty schools (0–25% FRL students) in comparison to the distribution of traditional public school students.

Table 14
Student Poverty Concentration, Charter and Traditional Public Schools, 2007–08

·	FRL	Total	Total Low-income	Percentage of All Students in
	Category	Students	Students	Each FRL Category
Charter Schools	0-25%	209,449	25,863	24%
	26-50%	199,091	74,668	23%
	51-75%	224,627	143,021	26%
	76-100%	245,343	213,475	28%
	Total	878,510	457,027	
Traditional public	0-25%	13,012,842	1,690,764	30%
schools	26-50%	13,502,972	5,036,684	31%
	51-75%	10,035,581	6,190,189	23%
	76-100%	7,069,977	6,124,645	16%
	Total	43,621,372	19,042,282	

Source: 2007-08 NCES Common Core of Data

Similar patterns of higher poverty concentration among charter schools are seen when examining earlier SASS data. As was the case with 2007–08 SASS data described previously, these data are drawn from a sample of charter and traditional public schools. In 2003–04, nearly one-half of charter schools sampled had a majority of students eligible for free or reduced lunch compared to only 41% of regular public schools. A higher percentage of charter schools also report no students eligible for the free lunch program—schools that may not offer the School Lunch Program—but in other categories, there were higher percentages of public schools reporting lower percentages of poor students.

Table 15
Student Poverty Concentration, Charter and Traditional Public Schools, 2003–04

	Percentage of students approved for National School Lunch Program					
	0%	1% to	5% to	10% to	24% to	50% or
		$4^{0}/_{0}$	9%	24%	49%	more
Total-All Schools	0.7	3.9	6	18.1	30.3	41
Charter School	1.2	1.2	3.5	17.6	26.9	49.6
Traditional Public	0.7	4	6	18.1	30.3	40.9
School						

Source: U.S. Department of Education, National Center for Education Statistics, School and Staffing Survey (SASS), "Public School Data File," 2003–04.

Charter Schools: Double Segregation by Race and Poverty. Research has demonstrated persistent links between racial segregation and poverty concentration (e.g., Orfield, 2009), and we see that this link is also strong when examining charter school student composition. Like regular public schools, more than 9 out of 10 charter schools where at least 90% of students were Black and Latino also contained a majority of students from low-income households. One-third of all charter schools (for which we also have FRL data) were schools where 90–100% of students were Black and Latino. No charter schools with at least 80% of students who were Black and Latino were low-poverty schools (0–10% of students was eligible for free or reduced lunch). Further, among the charter schools with less than a tenth of students who were Black and Latino, nearly half of them had less than one-quarter poor students.

Table 16

Overlap Between Racial and Economic Concentration in Charter and Traditional Public Schools, 2007–08

		Per	cent of	Black a	nd His	nanic S	tudents	in Sch	ools	
Free/Reduced	0-	10-	20-	30-	40-	50-	60-	70-	80-	90-
Lunch Percentage	10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
in School										
	,	Traditio	onal Pu	blic Scl	nools (N	V=77,17	'3)			
0-10%	17%	14%	4%	1%	1%	1%	1%	1%	1%	2%
10-25%	24%	29%	25%	14%	6%	3%	2%	1%	1%	1%
25-50%	39%	37%	42%	44%	39%	30%	21%	11%	5%	4%
50-100%	21%	20%	29%	41%	54%	66%	77%	87%	93%	93%
% of Schools	37%	11%	7%	6%	5%	4%	4%	4%	4%	11%
(Column Totals)										
		C	harter S	Schools	(N=2,8	368)				
0-10%	19%	22%	14%	8%	8%	3%	1%	4%	0%	0%
10-25%	28%	32%	29%	25%	13%	9%	12%	5%	4%	1%
25-50%	29%	29%	31%	43%	43%	34%	24%	19%	16%	6%
50-100%	24%	16%	26%	23%	35%	54%	63%	72%	80%	93%
% of Schools	17%	10%	7%	6%	4%	5%	5%	4%	7%	33%
(Column Totals)										

Source: 2007–08 NCES Common Core of Data; Note: only includes schools where FRL is 1 or greater (see Appendix for table including 0)

Students have differential exposure to poor students by race or ethnicity, and these differences are exacerbated within charter schools. The typical Black charter school student attended a school where two out of three students, on average, were poor. Black isolation in charter schools was 70%. Taken together, this indicates the typical Black charter school student goes to school with few non-poor or non-Black students. Latino charter school students also go to schools where more than 60% of students are poor. Exposure to poor students was higher for both Black and Latino students in charter schools than in traditional public schools.

³⁸ Note that this relationship has strengthened in recent years. Orfield & Lee (2007) found in 2005–06, 84% of segregated Black and Latino schools were also schools of concentrated poverty.

White students, however, experience lower exposure to poor students in charter schools than they do in traditional public schools. Less than one in three students in the schools of White charter school students are from low-income households, slightly less than among the schools of the typical White public school student.

Table 17
Exposure to Low-Income Students by Race-Ethnicity and Charter School Status, 2007–08

	Low-Income Students ³⁹			
	Charter School	Traditional Public School		
White	32%	33%		
Black	67%	60%		
Latino	62%	60%		
Asian	41%	37%		
American Indian	54%	54%		

Source: 2007-08 NCES Common Core of Data

In sum, the patterns of double segregation typically found among public schools are also present among charter schools as well. If anything, these data suggest that racial segregation may be even more tightly linked to poverty concentration in charter schools.

Enrollment of English Language Learner (ELL) Students in Charter Schools: What Conclusions Can We Draw?

English language learners are a huge and growing group of students who experience great academic difficulties. In comparison to diversity or desegregation efforts, states' charter school legislation is less likely to reflect requirements for enrolling ELL students; and while charter schools are subject to general federal anti-discrimination laws, there is little other guidance regarding the enrollment or instruction of ELL students in charter schools.

Fundamental data needed to assess the equity of access for ELL students to charter schools is missing in the federal data system. In some cases, the lack of data reaches the level of absurdity, as in California's 2007–08 data classifying just seven students as "Limited English Proficient" in the entire state, which includes well over a million children who grew up in non-English speaking homes. The lack of data on ELL students in charter schools in national datasets occurs despite a number of states requiring charter schools to report data on the enrollment, and sometimes assessment, of ELL students.

As a result, our discussion of ELL is exploratory. Students' ELL status is only reported at the district level, not the school level, in NCES Common Core. We supplemented our examination of ELL students and charter schools by obtaining data from the Office of Civil Rights' regular survey of schools. Even using both sources of data, we are only able to obtain ELL information on students in a fraction of charter schools. There are a large number of states in which charter schools

³⁹ This table is calculated by excluding all schools that reported missing or 0 as their number of FRL students. See Appendix for table A-25 including schools reporting no FRL students (but excluding schools reporting "missing").

⁴⁰ In 2005-06, California had nearly 1.6 million students classified as LEP. See http://www.ncela.gwu.edu/faqs/ (Accessed on December 2, 2009).

simply do not report ELL student information.⁴¹ Thus, the trends reported in this section should be viewed cautiously. The difficulty in understanding the extent to which ELL students enroll in charter schools emphasizes again the need for more comprehensive data about charter school students in order to be able to fully evaluate this reform, specifically the way it contributes to stratification of students along lines of race, class, and English language acquisition. Since these issues affect a large share of all students in U.S. public schools, researchers and policy makers must have complete data at the school level in every state.

Since many—but not all—charter schools are separate agencies (e.g., the equivalent of a school district), we first use NCES district-level data to examine the number of ELL students in charter schools and in traditional public schools. Most districts-agencies have no charter schools. Among these districts, 5% of all students, or more than 2.5 million students, are ELLs. A lower share of students, 4.6%, in agencies where all (either just one school or more than one) school(s) are charters were classified as ELL students, a total of just over 32,000 students. However, slightly less than 700 agencies have both charter and traditional public schools—and enroll a disproportionately high percentage of ELL students—making it hard to make a clear comparison since there is no school level data and we cannot tell from these district-level data whether these students were in charter schools or traditional public schools.

Table 18
Percentage of ELL Students by District's Charter School Status, 2007–08

	# of			%
	Districts/	# of	# of ELL	ELL
Types of Schools in District/Agency ⁴²	Agencies	students	Students	
Contains only charter schools	2,077	698,567	32,041	4.6%
Contains both charter and traditional				
public schools	677	11,565,609	771,513	6.7%
Contains only traditional public schools	14,066	36,913,628	1,756,828	4.8%

Source: 2007–08 NCES Common Core of Data

School-level data is needed to be able to understand the educational experiences of ELL students in charter or traditional public schools, which is not available from NCES Common Core. However, a large majority of the charter—only districts—agencies only had one school. In essence, we could treat these districts as schools, and they accounted for 44% of all charter schools in 2007–08. Approximately one-quarter of these nearly 1,500 charter schools had at least 1% of students classified as ELL, while more than 1,100 schools had a lower percentage of ELL students. A comparison of the racial composition of these one-school charter districts showed that they differed from districts with more than one school, making it difficult to understand the relationship between racial composition and ELL enrollment.

In sum, our examination of the enrollment of ELL students in charter schools through district-level NCES data illustrates the extreme difficulty of understanding the extent to which

⁴¹ These states with missing ELL data for charter schools include CT, DC, DE, IN, MA, MI, MN, MO, NC, NH, NJ, NY, OH, PA, UT, and WY. Three other states reported no ELL charter school students: AZ, MS, and TN.

⁴² In 2007–08, just over 1,200 agencies enrolling 5,600 students did not report the charter status of the schools associated with them. Although this educated a tiny fraction of all public school students, nearly 30% of these students were ELL.

charter schools—and the characteristics of those charter schools—enroll ELL students. It appears that ELL students are underenrolled (Heubert, 1997), and in many charter schools, according to what we can examine via NCES data, there is a trivial enrollment of ELL students. While this conclusion may be erroneous and stem from a dearth of data, this finding has implications for data reporting among all public schools. We need data to understand these major equity issues, and should consider halting expansion of these schools until we can fully assess them.

To examine ELL enrollment further, we also explored the enrollment of ELL students through two other federal datasets, although both contain information about only samples (not the entire universe) of schools. The periodic Schools and Staffing Survey in 2007–08 contained approximately 7,000 charter and traditional public schools. Slightly more than half of the charter schools in this sample reported at least one LEP student in 2007–08. A much higher percentage of traditional public schools reported enrolling LEP students (68%). At the same time, however, among those schools that did enroll LEP students, charter schools enrolled a higher percentage than traditional public schools.

The racial composition of charter schools enrolling LEP students differs from all charter schools by having lower percentages of Black students and much higher percentages of Latino students. Compared to traditional public schools known to enroll at least one LEP student, charters with LEP students have disproportionately lower percentage of White students. Some of these patterns may be the result of some charter schools in Arizona or California that are focused on providing bilingual education.

Table 19
Student Characteristics of Charter and Traditional Public Schools by LEP Status, 2007–08

	# of	% of	Enrollment	%	%	%	%	%
	Schools	schools		LEP	Latino	White	Black	Asian
			Cha	rter Sch	ool			
With LEP students	102	52%	49,575	14%	30%	45%	18%	5%
Without LEP students	95	48%	31,870	0%	11%	37%	46%	3%
	Traditional Public School							
With LEP students	4,601	68%	3,606,606	8%	18%	60%	14%	5%
Without LEP students	2,134	32%	938,959	0%	3%	76%	16%	2%

Source: Schools and Staffing Survey Data, 2007-08

The Office for Civil Rights dataset, which is not a national universe of schools, reports data on 926 charter schools and 51,988 traditional public schools. Among these samples, a slightly higher percentage of public school students are classified as ELL (9.9%) as compared to charter school students (8.7%). Both of these estimates are higher than those from the district-level NCES data described above (though lower than the Schools & Staffing Survey estimate for charter school students). As was the case in the SASS data analysis, the racial composition of both charter and traditional public schools reporting ELL info varies rather substantially among those in the CRDC sample. Schools in the Civil Rights Data Collection have higher percentages of Latino students, and lower percentages of white students. There is also an underrepresentation of Black students in charters included in the sample. Thus, any analysis of the racial composition of ELL and non-ELL students' schools may be biased by these discrepancies.

⁴³ Due to the nature of the monitoring responsibilities of OCR and the design of the sample, a higher percentage of public schools are included and have information about ELL students.

Table 20
Comparison of School Characteristics for Charter and Traditional Public Schools with ELL Data

ELL Information	Number	Student	% American	0/0	0/0	0/0	0/0
(2005–06)	of Schools	Enrollment	Indian	Asian	Latino	Black	White
<u> </u>	Traditional Public School						
No ELL Info	31,572	13,809,429	1%	4%	16%	12%	67%
With ELL Info	51,988	32,474,436	1%	5%	23%	18%	52%
	Charter School						
No ELL Info	2,957	847,167	1%	3%	20%	36%	40%
With ELL Info	926	346,119	1%	6%	33%	22%	38%

Sources: 2007–08 NCES Common Core of Data; 2005–06 CRDC

As a result of the lower enrollment of ELL students, charter students of color have lower exposure to ELL students. Exposure rate, as used here, measures the percentage of ELL students that the "typical" student of each race attends school with. In both charter and traditional public schools, White and Black students have the lowest exposure to ELL students. Latino students, conversely, have the highest exposure to ELL students, almost twice as high as students of any other racial-ethnic group. For the two groups of students with the highest exposure to ELL students in traditional public schools, the gap in exposure is larger when comparing to their charter school peers. While almost one in four students are ELL in a typical Latino student's public school, only one in six is in the typical Latino charter student's school. If these patterns hold across all schools, this suggests that as a result of the lower percentage of charter ELL students, charter minority students—who on average attend school with higher percentages of English Learners regardless of school sector—have lower exposure than their public school peers to ELL students.

Table 21
Exposure to ELL Students by Student Race for Charter and Traditional Public Students, 2005–06

	Percentage of ELL Students (Average)		
	Charter	Traditional Public	
White	4%	4%	
Black	5%	7%	
Latino	17%	24%	
Asian	8%	13%	
American Indian	10%	12%	

Sources: 2007–08 NCES Common Core of Data; 2005–06 CRDC

We also explored ELL and native English speakers' exposure to students of different racial groups. Not surprisingly, across both charter and traditional public schools, ELL students have lower exposure to White and Black students and substantially increased exposure to Latino students (Figure A-8 in Appendix). This difference is further exacerbated for ELL students attending charter schools, where they typically attend a school that has more than 60% of students who are Latino. For these charter school students, the increased exposure to Latino students is paired with considerably lower exposure to Black students than is the case for native English speakers in charter schools. These trends should be interpreted cautiously due to the disproportionate racial composition of schools included in the CRDC dataset.

In conclusion, we need more thorough reporting of ELL classification of students in all schools, particularly charter schools. A simple question such as whether charter schools enroll a

higher percentage of ELL students than traditional public schools cannot be definitively answered. Exploring the relationship between racial composition and concentration of ELL students suffers from these gaps in data. Among the schools for which we do have data, it is clear that ELL students attend schools with quite different racial compositions, and these differences are starker among charter schools.

Conclusion

Our findings suggest that charters currently isolate students by race and class. Research has long documented trends of rising segregation among public schools. As charters represent an increasing share of our public schools, they influence the level of segregation experienced by all of our nation's school children. Politicians across the ideological spectrum agree that a child's place of residence should not determine their ability to access educational opportunity. Theoretically charter schools, which can enroll students across district boundaries, possess the ability to deliver on the sentiments of national leaders, in part by not having the diversity constraints of traditional public schools. Our analysis indicates, however, that charter schools fail to fulfill their integrative potential in most areas of the country. And as a result, the charter sector currently represents a missed opportunity for students to experience the greater educational and social benefits evident in diverse schools.

This analysis of recent data finds that charter schools are more racially isolated than traditional public schools in virtually every state and large metropolitan area in the nation. While there are examples of charter schools with vibrant diversity, this article shows these schools to be the exception. Further, extensive studies exploring charter school benefits reveal no net academic gains for students as indicated by test scores. We also know almost nothing about the impact of charters on other achievement benchmarks like graduation rates or college matriculation, especially for racial and ethnic subgroups, despite their vital importance to the goals of our public schools. The lack of comprehensive data about many charter school students makes the task of assessing such outcomes particularly challenging.

In spite of these fundamental civil rights concerns, the enrollment of charter schools has nearly tripled since 2000–01. With this expansion has come an increased level of funding and support from federal, state and local education agencies. In fact the numbers of students currently enrolled in charters, just over one million students, is still relatively small and concentrated in a handful of states. Yet several new federal initiatives will likely result in an even more rapid expansion in the coming years than in the previous decade. The policies encouraging charter growth are built upon the belief that charter schools can contribute significantly to improving our public schools. But of the potential benefits, the capacity of charters to foster diversity is almost never mentioned. If the incentives to create more charters succeed, it would be inexcusable to have overlooked their integrative potential during this period of expansion.

Segregation and inequality still divide our society along the lines of race and class, and educational literature documents the myriad ways in which school choice may exacerbate this

⁴⁴ Because research indicates that boundaries are a major contributor to overall segregation (e.g., Clotfelter, 2004; Frankenberg, 2009; Reardon & Yun, 2005), charter schools' ability to draw students from multiple neighborhoods and districts could alleviate racial isolation.

⁴⁵ The Obama administration has pledged to double spending for charter schools in four years, including a nearly 20% increase in its FY 2010 budget request for the Charter Schools Program. Two major federal funding programs, providing nearly \$8 billion in revenue through competitive grants processes, give incentives for loosening state restrictions on the number of charter schools and converting underperforming schools into charters (see Dillon, 2010; McNeil, 2009).

stratification (Fuller, et al., 1996; Petrovich & Wells, 2005). Fortunately, studies also show integration and choice can coexist successfully with certain structures in place to mitigate the divisive effects of choice (e.g., Betts, et al., 2006; Chavez & Frankenberg, 2009). Yet, as educational choice continues to be affirmed as an important value for parents, underscored by the increasing emphasis on student assignment plans that seek to incorporate family choice, those important mitigating structures (e.g. free transportation, outreach, and integration goals) are not being considered. For example, the provision of transportation and subsidized lunches is likely essential to the process of attracting low-income and minority students, and the location of charter schools also affects student body diversity. As a result, it is important to provide equitable transportation support. State or federal transportation reimbursement should be equalized across school sectors to provide greater access and choice while not unduly burdening charter school operators or public school districts.

The severe lack of essential data on charters is of concern. Basic questions about the extent to which charter schools enroll low-income and ELL students cannot be conclusively answered and represent major research and civil rights policy concerns. One-quarter of charter schools did not report whether they enrolled students eligible for free or reduced-price lunch (FRL), a common measure of students from low-income households (see also Carnoy, et al., 2005; Eberts & Hollenbeck, 2002). In a number of states, charter schools *not* reporting FRL data had more extensive concentration of White students than those that did. Estimates suggest that charter schools may underenroll ELL students, but the data are inconclusive on this point. This could suggest low-income, minority, and English Language Learner students may not have access to some charter schools to the same extent as white and middle-class children do.

Among those schools that did report data about FRL students, charter schools nationally enrolled a higher percentage of low-income students than traditional public schools. In fact, among the schools reporting FRL data across the nation, higher percentages of charter schools contained extreme concentrations of poor students than regular public schools. And, from what we can tell from available data, concentrations of low-income students overlap strongly with concentrations of minority students in charter schools. In other words, instead of policy offering parents a real choice out of high-poverty, racially isolated schools, charter schools simply intensify patterns of isolation prevalent among traditional public schools.

States often have weak civil rights and equity policies regarding charter school establishment and enrollment (Frankenberg & Siegel-Hawley, 2009). Little state or federal direct action has been taken to change or correct racial isolation in charter schools despite growing evidence about this persistent and growing problem. Our new findings demonstrate that, while segregation for Blacks among all public schools has been increasing for nearly two decades, black students in charter schools are *far* more likely than their traditional public school counterparts to be educated in intensely segregated settings. Two out of every three Black charter school students attend intensely segregated schools in fifteen states (among states with at least 5,000 charter students) across the country. In four of those states, 90% of Black students attend a hyper-segregated charter school. These figures are staggering, and remain considerably higher than in states with the highest Black segregation among regular public schools. Finally, more than two-fifths of black charter school students attended schools where 99% of students were from underrepresented minority backgrounds. That figure was, by far, the highest of any other racial group, and nearly three times as high as black students in traditional public schools.

While patterns of charter school segregation are most striking for Black students, other racial groups have also experienced greater isolation due to charters. In the West, where traditional public schools are the most racially diverse, and in some areas of the South, White students are overenrolled in charter schools. In some cases, White segregation is higher in charter schools despite

the fact that overall charter schools enroll fewer White students. These trends suggest that charter schools are contributing to "white flight" in the country's two most racially diverse regions.

Latinos are underenrolled in charter schools in some Western states, though they make up the largest share of students. Latino charter students are less segregated than Blacks overall; but in a dozen states, a majority of Latino charter students are in highly segregated minority schools, including states (like Arizona and Texas) educating large numbers of Latinos.

Charter schools are most likely to be established in urban locales, alongside traditional public school systems that educate a disproportionate number of low-income and minority students. More than half of charter schools located in cities enrolled at least 90% students of color in 2007–08, indicative of considerably higher segregation in urban charters even when compared to their regular, already isolated, public school counterparts.

All of these trends mean that charter schools educate a set of students stratified along the dimensions of race, class, and possibly language. Yet the charter school movement is a relatively young one, and there remains the opportunity to alter these patterns. Because segregation continues to be associated with truncated educational and life prospects, we must begin to envision and implement an alternative charter school reality.

The Obama Administration, like its predecessors, is emphasizing choice and innovation, primarily in the form of new charter schools, as a way to improve the education of all students. The federal education stimulus application requirements have already created a ripple effect in state legislation regarding charter schools (Dillon, 2010). If, as the Administration has proclaimed, education is the "civil rights issue of our time," then federal leadership is needed to provide incentives for improving the integrative quality of charter schools, along with clear safeguards to prevent the resegregation of public schools via increasing charter school enrollment. Such efforts should include comprehensive annual data collection and improving academic and social outcomes for charter schools.

More than half a century after the Supreme Court ruled that separate schooling was fundamentally unequal; a massive and accumulating body of social science evidence continues to affirm that unanimous decision. This study shows that charter schools comprise a divisive and segregated sector of our already deeply stratified public school system. This must change if we truly want to promote access to integrated, high-quality education for all. To do so requires the efforts of educational leaders and policymakers at all levels of government, as well as the commitment of the creative, talented leaders of the charter school community. Everyone must work to build a more inclusive sector of schools, one that magnifies and strengthens the role of choice in fostering integration and equality in American education.

⁴⁶ States that altered charter school policies in advance of submitting their Race to the Top applications for Phase 1 include California, Illinois, Tennessee, Louisiana, and Mississippi. Yet, some states also rejected proposals to pass charter school legislation (Kentucky) or to raise the cap on charter schools (New York). See "States Change Laws in Hopes of Race to the Top Edge" accessed on January 20, 2010 at http://www.edweek.org/ew/articles/2010/01/20/19rtt-sidebar.h29.html and "The Race to the Top" accessed on January 20, 2010 at http://www.whitehouse.gov/sites/default/files/RTT_factsheet.pdf.

References

- Ascher, C., Jacobowitz, R., & McBride, Y. (1999) Standards-based reform and the charter school movement in 1998-99: An analysis of four states. Final Report to the Edna McConnell Clark Foundation.
- Bell, C. A. (2009). All choices created equal? The role of choice sets in the selection of schools. Peabody Journal of Education: Issues of Leadership, Policy, and Organizations, 84(2), 191-208.
- Berman, P., Nelson, B., Perry, R., Silverman, D., Solomon, D., & Kamprath, N. (1999). *The state of charter schools: Third-year report.* Washington, D.C.: U.S. Department of Education, Office of Educational Research and Improvement.
- Betts, J., Rice, L. A., Zau, A. C., Tang, Y. E. & Koedel, C. R. (2006). *Does school choice work? Effects on student integration and achievement.* San Francisco, CA: Public Policy Institute of California.
- Bifulco, R., & Ladd, H. F. (2007). Charter schools in north carolina. In M. Berends, M. Springer, M. & H. Walberg (Eds.), *Charter school outcomes* (pp. 195-220). New York: Lawrence Elrbaum Associates.
- Bifulco, R., Ladd, H. F., & Ross, S. (2009). The effects of public school choice on those left behind: Evidence from Durham, North Carolina. *Peabody Journal of Education: Issues of Leadership, Policy, and Organizations, 84*(2), pages?.
- Booker, K., Gilpatric, S., & Gronberg, T. (2008). The effect of charter schools on traditional public school students in Texas: Are children who stay behind left behind? *Journal of Urban Economics*, 64(1), 123-145.
- Booker, K., Zimmer, R., & Budin, R. (2005). The effects of charter schools on school peer composition. Rand Corporation. Retrieved 11.7.09 at http://www.rand.org/pubs/working-papers/WR306/.
- Braddock, J. (2009). Looking back: The effects of court-ordered desegregation, in Smrekar, C. & Goldring, E. (Eds.), From the courtroom to the classroom: The shifting landscape of school desegregation (pp.3-18). Cambridge: Harvard Education Press.
- Buckley, J., & Schneider, M. (2007) *Charter schools: Hope or hype?* New Jersey: Princeton University Press.
- Carnoy M., Jacobsen, R., Mishel, L., & Rothstein, R. (2005). The charter school dust-up: Examining the evidence on enrollment and achievement. New York: Teachers College Press.
- Carr, M., & Ritter, M. (2007). Measuring the competitive effect of charter schools on student achievement in Ohio's traditional public schools. Paper submitted to National Center for Study of Privatization in Education. NY: Columbia University. Retrieved 12.10.09 at http://www.ncspe.org/publications-files/OP146.pdf
- Center for Education Policy and Practice. Charter School Success or Selective Out Migration of Low Achievers? Effects of enrollment management on student achievement. Retrieved 9.27.09 at http://www.massteacher.org/news/headlines/charterschools0909.pdf.
- Center for Research on Educational Outcomes. Multiple choice: Charter school performance in sixteen states. Stanford: CREDO. Retrieved 11.2.09 at http://credo.stanford.edu/reports/MULTIPLE CHOICE CREDO.pdf.
- Chavez, L., & Frankenberg, E. (2009). *Integration defended: Berkeley unified's strategy to maintain school diversity*. Los Angeles: Civil Rights Project.
- Chubb, J. E., and Moe, T.M. (1990). *Politics, markets, and America's schools*. Washington, DC: Brookings Institution.
- Clotfelter, C. T. (2004). Private schools, segregation, and the southern states. *Peabody Journal of Education*, 79(2), 74-97.

- Cobb, C. D., & Glass G. V. (1999). Ethnic segregation in Arizona charter schools. *Education Policy Analysis Archives*, 7(1), Retrieved 11.19.10 at http://epaa.asu.edu/ojs/article/view/536.
- d' Entremont, C. & Gulosino, C. (in press). Circles of influences. How neighborhood demographics and charter school locations influence student enrollments. *Education Policy Analysis Archives*.
- Dillon, S. (2010 January 18). Opposition to education grants program emerges. *New York Times*. Retrieved 1.18.10 at http://www.nytimes.com/2010/01/19/education/19educ.html?hp.
- Eaton, S., & Chirichigo, G. (2009 July 19). Charters must commit to diversity. *Boston Globe*. Retrieved 9.14.09 at http://www.boston.com/bostonglobe/editorial_opinion/oped/articles/2009/07/19/charters_must_commit_to_diversity/.
- Eberts, R., & Hollenbeck, K. (2002). *Impact of charter school attendance on student achievement in Michigan*. Staff Working Papers 02-80, W.E. Upjohn Institute for Employment Research.
- Finn, C., Manno, B., & Vanourek, G. (2006). *Charter schools in action: Renewing public education*. Princeton, NJ: Princeton University Press.
- Finnigan, K., Adelman, N., Anderson, L., Cotton, L., Donnelly, M. B., & Price, T. (2004).

 Evaluation of charter schools program: 2004 Final Report. U.S. Department of Education.

 Policy and Programs Study Service. Retrieved 10.28.09 at

 http://www.eric.ed.gov/ERICDocs/data/ericdocs2sql/content-storage-01/0000019b/80/29/d8/04.pdf
- Frankenberg, E. (2009). Splintering school districts: Understanding the link between segregation and fragmentation. *Law & Social Inquiry*, 34(4), 869 909.
- Frankenberg, E., & Lee, C. (2003) Charter schools and race: A lost opportunity for integrated education. *Education Policy Analysis Archives*, 11(32), pages?.
- Frankenberg, E., & Siegel-Hawley, G. (2009). Overlooking equity: Charter schools and civil rights policy. Los Angeles: UCLA Civil Rights Policy. Retrieved 1.08.10

 http://www.civilrightsproject.ucla.edu/research/deseg/equity-overlooked-report-2009.pdf
- Friedman, M. (1955). The role of government in education, in Solo, R.A., Ed., *Economics and the public interest*. New Brunswick, N.J.: Rutgers University Press, pp. 123-144.
- Fuller, B., Elmore, R. F. & Orfield, G. (Eds). (1996). Who chooses? Who loses? Culture, institutions, and the unequal effects of school choice. New York: Teachers College Press.
- Gándara, P., & Hopkins, M. (2009). Forbidden language: English learners and restrictive language policies. New York: Teachers College Press.
- Garcia, D. (2007). The impact of school choice on racial segregation in charter schools. *Educational Policy*, 22(6): pp. 805 829.
- Gewirtz, S., Ball, S. J., & Bowe, R. (1995). *Markets, choice and equity in education*. Buckingham: Open University Press.
- Gifford, M., Ogle, M., & Solomon, L. (1999). Who is choosing charter schools? A snapshot of geography and ethnicity of charter school students (No. 2). Phoenix, AZ: Center for Market-Based Education.
- Gumus-Dawes, B., & Luce, T. (2010). The state of public schools in post-Katrina New Orleans: The challenge of creating equal opportunity. Minneapolis: Institute on Race and Poverty.
- Guryan, J. (2004). Desegregation and black dropout rates. *American Economic Review*, 94(4), 919-943.
- Henig, J. (2008). Spin cycle: How research is used in policy debates: The case of charter schools. New York: Routledge.
- Heubert, J. (1997). Schools without rules? Charter schools, federal disability law, and the paradoxes of deregulation. *Harvard Civil Rights-Civil Liberties Law Review*, 32(2),301-353
- Hoxby, C., Murarka, S., & Kang, J. (2009 September). How New York City's charter schools affect achievement. Second report in series. Cambridge, MA: New York City Charter Schools Evaluation Project.

- Holt, M. (2000). Not yet "rree at last": The unfinished business of the civil rights movements: Our battle for school choice. Oakland, CA: Institute for Contemporary Studies.
- Hoxby, C. (2004 December). Achievement in charter schools and regular public schools in the United States: Understanding the differences. Cambridge: Harvard University, unpublished manuscript.
- Institute on Race & Poverty. (2008). Failed promises: Assessing charter schools in the Twin Cities. Minneapolis, MN: Institute on Race & Poverty at University of Minnesota Law School.
- Koedel, C., et al. (2009). The social cost of open enrollment as a school choice policy. Working paper, http://economics.missouri.edu/working-papers/2009/wp0910_koedel.pdf (accessed October 27, 2009).
- Kurki, A., Boyle, A., & Aladjem, D. K. (2005). Beyond free lunch Alternative poverty measures in educational research and program evaluation. American Institutes for Research. Retrieved 10.27.09 at http://www.air.org/news/documents/AERA2005Alternative%20Poverty%20Measures.pdf
- Linn, R. L., & Welner, K. G. (Eds.). (2007). Race-conscious policies for assigning students to schools: Social science research and the Supreme Court cases. Washington, DC: National Academy of Education.
- Lubienski, S. T., & Crane, C. C. (2010). Beyond free lunch: Which family background measures matter? *Education Policy Analysis Archives*. http://epaa.asu.edu/ojs/article/view/756
- Massey, D. S., and Denton, N. A. (1988). The dimensions of residential segregation. *Social Forces*, 67, 281-315.
- McEwan, P. (2008). Evaluating multigrade school reform in Latin America. *Comparative Education*, 465-483;
- McNeil, M. (2009 August 26). Tight leash likely on turnaround aid. *Education Week*. Retrieved 1.19.10 at http://www.edweek.org/ew/articles/2009/08/26/02title1.h29.html
- Miron, G., Urschel, J., Mathis W., & Tornquist, E. (2010) Schools without diversity: Education management organizations, charter schools, and the demographic stratification of the American school system. EPIC/EPRU. http://epicpolicy.org/files/EMO-Seg.pdf
- Morphis, E. A. (2009). *The shift to school choice in New Zealand*, National Center for the Study of Privatization Occasional Paper 179, http://www.ncspe.org/publications_files/OP179.pdf (accessed October 27, 2009).
- Moscovitch, E. (2009). No magic bullet: Charters don't necessarily outperform other schools. Mass Inc. Retrieved 11.10.10 at http://www.massinc.org/fileadmin/CommonWealth/Summer 2009/Perspective1.pdf
- Multicultural Education, Training and Advocacy (META) (2009). Charter schools and English language learners in Massachusetts: Policy Push without the Data. Retrieved 11.2.09 at http://www.edweek.org/media/metacharterschoolbrief.pdf
- National Alliance for Public Charter Schools (2009 October). Top Ten Communities by Market Share, 4th Edition. Washington, D.C.: National Alliance for Public Charter Schools. Retrieved 11.18.10 at http://www.publiccharters.org/files/publications/MarketShare-P4.pdf.
- Nelson, B., Berman, P., Ericson, J., Kamprath, N., Perry, R., Silverman, D., & Solomon, D. (2000). *The state of charter schools 2000: Fourth-year report.* Washington, D.C.: U.S. Department of Education, Office of Educational Research and Improvement.
- Ni, Y. (2007). Are charter schools more racially segregated than traditional public schools? East Lansing: Michigan State University, Education Policy Center, Policy Report 30.
- Orfield, G. (1978). Must we bus?: Segregated schools and national policy. Washington, DC: Brookings Institution
- Orfield, G. (2009). Reviving the goal of an integrated society: A 21st century challenge. Los Angeles: Civil Rights Project/Proyecto Derechos Civiles, UCLA.

- Orfield, G., Bachmeier, M., James, D., & Eitle, T. (1997). Deepening segregation in American public schools. *Equity and Excellence in Education*, 30, 5-24.
- Orfield, G. & Frankenberg, E. (2008). The Last have become the first: Rural and small town America lead way on desegregation. Los Angeles: Civil Rights Project Proyecto Derechos Civiles, UCLA.
- Orfield, G., & Lee, C. (2007). Historic reversals, accelerating resegregation, and the need for new integration strategies. Los Angeles: The Civil Rights Project/ Proyecto Derechos Civiles, UCLA.
- Orfield, G., & Lee, C. (2004). *Dropouts in America: Confronting the graduation rate crisis.* Cambridge, MA: Harvard Education Press.
- Petrilli, M. (2009). Is separate but equal the best we can do? *Education Gadfly*. Thomas B. Fordham Foundation. Retrieved 1.12.10 at http://www.edexcellence.net/issues/results.cfm?withall=charter+schools+diversity&search_btn.y=0
- Petrovich, J., and Wells, A. S. (Eds.) (2005). Bringing equity back: Research from a new era in American educational policy. New York: Teachers College Press
- Reardon, S. F., & Yun, J. T. (2002) *Private school racial enrollments and segregation*. Cambridge, MA: Harvard Civil Rights Project.
- Reardon, S. F., & J. T. Yun. (2005). Integrating neighborhoods, segregating schools: The retreat from school desegregation in the south, 1990-2000. In J. C. Boger & G. Orfield (Eds.), *School resegregation: Must the south turn back?* (pp. 51-69). Chapel Hill: University of North Carolina Press.
- Reardon, S. F. (2009). Review of "How New York City's charter schools affect achievement."

 Boulder and Tempe: Education and the Public Interest Center & Education Policy Research Unit. Retrieved 12.15.09 from http://epicpolicy.org/thinktank/review-How-New-York-City-Charter
- Renzulli, L. A., & Evans, L. (2005). School choice, charter Schools, and white flight. *Social Problems*, 52, 398-418.
- Saporito, S., & Sahoni, D. (2006). Mapping educational inequality: concentrations of poverty among poor and minority students in public schools. *Social Forces*, 85, 1227–1253.
- Scott, J. (2009). The politics of venture philanthropy in charter school policy and advocacy. *Education Policy*, 23 (1), 106-136.
- Stulberg, L. (2008). Race, schools & hope: African Americans and school choice after Brown. New York: Teachers College Press.
- Tough, P. (2008). Whatever it takes: Geoffrey Canada's quest to change Harlem and America. Boston: Mariner Books.
- U.S. Department of Education. (2005). America's charter schools: Results from the NAEP 2003 Pilot Study. U.S. Department of Education Sciences, NCES 2005-456. Retrieved 11.6.09 at http://nces.ed.gov/nationsreportcard/pdf/studies/2005456.pdf.
- Van Lier, P. (2009). *Ready to learn: Ohio assessment shows charters and magnets get head start.* Policy Matters Ohio. Retrieved 1.13.10 at http://www.policymattersohio.org/pdf/ReadyToLearn2009.pdf.
- Vaznis, J. (2009 September 16). Charter schools see more attrition, fewer students are graduating, union study finds. *Boston Globe*. Retrieved 10.1.09 at http://www.boston.com/news/local/massachusetts/articles/2009/09/16/charter_schools_see_more_attrition_union_study_finds/?page=2
- Viadero, D. (2009a). Scholars Spar Over Research Methods Used to Evaluate Charters. *Education Week*. Retrieved 12.15.09 at <a href="http://www.edweek.org/login.html?source=http://www.edweek.org/ew/articles/2009/10/08/07credo.h29.html&destination=http://www.edweek.org/ew/articles/2009/10/08/07credo.h29.html&levelId=2100.

- Viadero, D. (2009b). Inside charter school research: The beat(ing) goes on. *Education Week*. Retrieved 12.15.09 at http://blogs.edweek.org/edweek/inside-school-research/2009/11/the-back-and-forth-on-charter.html?qs=charter+school+research+hoxby.
- Wald, J., & Losen, D. (2005). Confronting the graduation crisis in the South. Cambridge: Harvard Civil Rights Project.
- Wamba, C., & Asher, N. (2003). An examination of charter school equity. *Education and Urban Society*, 35(4), 462-476.
- Wells, A. S., et al. (2005). Charter school reform and the shifting meaning of educational equity: Greater voice and greater inequality? In Petrovich, J., and Wells, A. S., (Eds.), *Bringing equity back: Research from a new era in American educational policy* (pp. 219-243). New York: Teachers College Press.
- Wells, A. S., Holme, J. J., Lopez, A., & Cooper, C. W. (2000). Charter schools and racial and social class segregation: Yet another sorting machine? In R. Kahlenberg (Ed.), *A notion at risk:*Preserving education as an engine for social mobility (pp. 169-222). New York: Century Foundation Press.
- Welner, K. G., & Howe, K. R. (2005). Steering toward separation: The evidence and implications of special education students' exclusion from choice schools. In J. Scott (Ed.), *School choice and diversity* (pp. 93-111). New York: Teachers College Press.
- Zimmer, R., & Buddin, R. (2006 September). Charter schools' performance in two urban districts. *Journal of Urban Economics*, 60, pages?.
- Zimmer, R., Gill, B., Booker, K, Lavertu, S., Sass, T. R., & Witte, J. (2009). *Charter schools in eight states: Effects on achievement, attainment, integration, and Competition*. Santa Monica, CA: Rand Corporation.
- Zimmer, R., Blanc, S., Gill, B., & Christman, J. (2008). Evaluating the performance of philadelphia's charter schools. Rand Cooperation. Retrieved 11.5.09 at http://www.rand.org/pubs/working-papers/2008/RAND-WR550.pdf

Appendix

*Table A-1*Charter School Enrollment and Growth, 2000–01 and 2007–08⁴⁷

	Enrollment 2007-08	Enrollment 2000-01	% Change from 2000 to 2007
AK	3,500	2,594	35%
AR	4,988	708	605%
AZ	98,728	45,596	117%
CA	238,226	112,065	113%
CO	54,161	20,155	169%
CT	3,743	2,429	54%
DC	19,543	0	n/a
DE	8,396	2,716	209%
FL	98,519	26,893	266%
GA	32,880	20,066	64%
HI	6,663	1,343	396%
ÍΑ	691	0	n/a
D	10,405	1,083	861%
IL	24,837	7,552	229%
IN	11,120	0	n/a
KS	3,047	67	4448%
LA ⁴⁸	21,055	3,212	556%
MA	25,036	13,712	83%
MD	5,912	0	n/a
MI	99,360	54,750	81%
MN	26,066	9,395	177%
MO	14,877	7,061	111%
MS	375	367	2%
NC	31,193	15,523	101%
NH	478	0	n/a
NJ	17,498	10,179	72%
NM	9,854	1,335	638%
NV	6,065	1,255	383%
NY	30,939	0	n/a
HC	79,884	14,745	442%
OK	5,362	1,208	344%
OR	11,636	559	1982%
PA	66,613	18,981	251%
RI	1,817	557	226%
SC	5,452	483	1029%
ΓN	2,742	0	n/a
ГХ	71,645	37,978	89%
UT	19,374	537	3508%
VA	240	55	336%
WI	34,275	9,511	260%
WY	255	0	n/a
U.S. Total	1,207,450	444,670	172%

Source: 2007–08 NCES Common Core of Data; Frankenberg & Lee, 2003

⁴⁷ In 2000, one school in Maine with 154 students was designated as both a magnet and charter school, but after further review, we deemed that it was not a charter school and do not include it here.

⁴⁸ In 2007-08, most of Louisiana's charter schools were classified as other/alternative schools (47 enrolling 18,650 students). We reclassified them as regular charter schools for our analysis here.

*Table A-2*Number of Charter Schools by State, 2000–01 and 2007–08

State	Charter Schools by State, 2000–01 and 20 Charter Schools, 2000–01	Charter Schools 2007–08
AK	18	20
AR	3	20
AZ	288	448
CA	257	675
CO	73	127
СТ	16	15
DC	0	66
DE	6	16
FL	145	305
GA	30	62
НІ	6	28
IA	0	4
ID	9	30
IL	19	36
IN	0	40
KS	1	28
LA	19	51
MA	41	61
MD	0	24
MI	178	266
MN	67	160
MO	21	39
MS	1	1
NC	90	91
NH	0	10
NJ	51	57
NM	9	62
NV	8	20
NY	0	95
ОН	64	293
OK	6	15
OR	4	77
PA	65	123
RI	1	7
SC	6	28
TN	0	12
TX	135	218
UT	7	54
VA	0	3
WI	78	193
WY	0	3
Total	1,704	3,836

Source: 2007–08 NCES Common Core of Data; Frankenberg & Lee, 2003

Table A-3 Charter School Students as Percentage of Total Public School Enrollment

State	Charter Enrollment 2007–08	% of Public School Enrollment
State	South Re	
AL	0	0.0%
AR	4,988	1.0%
FL	Ź	3.8%
GA	98,519 32,880	2.0%
LA	21,055	3.1%
MS	375	0.1%
NC	31,193	2.2%
SC	5,452	0.8%
TN	2,742	0.3%
TX	71,645	1.6%
VA	240	0.0%
V 11	West Re	
AZ	98,728	9.2%
$\frac{\Lambda Z}{CA}$	238,226	4.1%
$\frac{CA}{CO}$	54,161	6.9%
ID	10,405	3.9%
MT	0	0.0%
$\frac{M1}{NM}$	9,854	3.1%
NV	6,065	1.4%
OR	11,636	2.1%
UT	19,374	3.5%
WA	0	0.0%
WY	255	0.3%
- VV 1	Border R	
DC	19,543	28.5%
DE	8,396	7.4%
KY	0	0.0%
MD	5,912	0.7%
MO	14,877	1.6%
OK	5,362	0.8%
WV	0	0.0%
	Northeast 1	
СТ	3,743	0.7%
ME	0	0.0%
-	·	
	•	
	· · · · · · · · · · · · · · · · · · ·	
MA NH NJ NY PA RI VT	25,036 478 17,498 30,939 66,613 1,817 0	2.7% 0.2% 1.3% 1.1% 3.8% 1.3% 0.0%

	Midwe	est Region
IA	691	0.1%
IL	24,837	1.2%
IN	11,120	1.1%
KS	3,047	0.7%
MI	99,360	6.2%
MN	26,066	3.2%
ND	0	0.0%
NE	0	0.0%
ОН	79,884	4.4%
SD	0	0.0%
WI	34,275	3.9%
	C	Other
AK	3,500	3.0%
HI	6,663	0.0%

Table A-4
Charter School Enrollment and Percentage of Total Enrollment by MSA

Metropolitan Area	Charter	Charter	Charter
1	Schools	Enrollment	0/0
Albuquerque, NM	38	6,886	5.2%
Atlanta-Sandy Springs-Marietta, GA	43	24,645	2.7%
Boston-Cambridge-Quincy, MA-NH	45	15,515	2.5%
Chicago-Naperville-Joliet, IL-IN-WI	45	27,375	1.7%
Cincinnati-Middletown, OH-KY-IN	29	9,533	2.9%
Cleveland-Elyria-Mentor, OH	64	15,733	5.0%
Colorado Springs, CO	21	8,829	8.2%
Columbus, OH	61	19,506	6.6%
Dallas-Fort Worth-Arlington, TX	43	16,856	1.5%
Dayton, OH	35	8,118	6.4%
Denver-Aurora, CO	72	30,183	7.6%
Detroit-Warren-Livonia, MI	158	65,387	9.0%
Fresno, CA	25	8,077	4.4%
Honolulu, HI	28	6,663	3.7%
Houston-Sugar Land-Baytown, TX	84	27,618	2.5%
Indianapolis-Carmel, IN	22	5,951	2.1%
Kansas City, MO-KS	26	7,199	2.2%
Los Angeles-Long Beach-Santa Ana, CA	172	73,064	3.6%
Miami-Fort Lauderdale-Pompano Beach, FL	130	43,493	5.7%
Milwaukee-Waukesha-West Allis, WI	70	20,039	8.4%
Minneapolis-St. Paul-Bloomington, MN-WI	114	21,103	4.2%
New Orleans-Metairie-Kenner, LA	41	18,134	13.6%
New York-Northern New Jersey-Long Island, NY-NJ-PA	101	30,586	1.2%
Orlando-Kissimmee, FL	32	12,317	3.6%
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	97	55,067	6.6%
Phoenix-Mesa-Scottsdale, AZ	265	69,245	9.5%
Portland-Vancouver-Beaverton, OR-WA	31	4,487	1.4%
Prescott, AZ	30	3,564	13.4%
Riverside-San Bernardino-Ontario, CA	36	15,190	1.9%
SacramentoArden-ArcadeRoseville, CA	52	22,072	6.7%
San Antonio, TX	36	14,261	3.8%
San Diego-Carlsbad-San Marcos, CA	73	37,850	8.0%
San Francisco-Oakland-Fremont, CA	76	19,674	3.8%
San Jose-Sunnyvale-Santa Clara, CA	26	10,982	4.3%
Santa Rosa-Petaluma, CA	27	6,193	9.4%
Tampa-St. Petersburg-Clearwater, FL	31	5,822	1.5%
Toledo, OH	32	13,912	12.8%
Tucson, AZ	87	14,834	10.1%
Washington-Arlington-Alexandria, DC-VA-MD-WV	71	20,713	2.5%

Table A-4 (cont.)
Charter School Enrollment and Percentage of Total Enrollment by MSA
Between 10 and 20 charter schools in MSA

Between 10 and 20 charte	r schools in MSA		
Akron, OH	16	2,397	2.3%
Albany-Schenectady-Troy, NY	10	2,528	2.0%
Appleton, WI	14	2,053	5.5%
Austin-Round Rock, TX	14	2,710	1.0%
Baltimore-Towson, MD	18	4,580	1.3%
Boise City-Nampa, ID	16	6,795	6.4%
Bradenton-Sarasota-Venice, FL	14	4,014	5.0%
Buffalo-Niagara Falls, NY	16	7,140	4.3%
Cabton-Massilon, OH	10	988	1.5%
Cape Coral-Fort Meyers, FL	12	7,418	9.4%
Charlotte-Gastonia-Concord, NC-SC	14	5,867	2.1%
Chico, CA	10	1,705	5.8%
Durham, NC	14	4,092	6.0%
Eureka-Arcata-Fortuna, CA	10	1,255	7.9%
Flint, MI	11	5,109	6.6%
Gainesville, FL	10	922	2.9%
Grand Rapids-Wyoming, MI	18	7,837	5.9%
Lake Havasu City-Kingman, AZ	14	3,615	13.1%
Lakeland-Winter Haven, FL	19	8,778	9.6%
Little Rock-North Little Rock, AR	10	2,144	2.0%
Madison, WI	10	1,008	1.3%
Modesto, CA	19	5,547	5.6%
Oklahoma City, OK	12	4,479	2.2%
Pittsburgh, PA	16	12,482	3.8%
Provo-Orem, UT	17	8,045	7.1%
Raleigh-Cary, NC	15	5,666	3.2%
Redding, CA	13	2,025	7.9%
St. Louis, MO-IL	18	8,251	2.0%
Salt Lake City, UT	19	6,061	2.9%
Santa Cruz-Watsonville, CA	10	2,931	8.2%
Sierra Vista-Douglas, AZ	10	1,519	7.3%
Stockton, CA	15	4,173	3.2%
Truckee-Grass Valley, CA	13	3,526	20.8%
Youngstown-Warren-Boardman, OH-PA	14	3,587	4.1%
Yuba City, CA	10	2,385	7.9%
Course 2007, 09 NCES Common Comp of Date		-	

Table A-5
Enrollment and Racial Composition of Charter Schools by State, 2007–08

						American Indian
State	Enrollment	White (%)	Black (%)	Latino (%)	Asian (%)	(%)
CA	238,226	38%	12%	41%	7%	1%
AZ	98,728	52%	7%	34%	3%	4%
MI	98,722	34%	57%	5%	2%	1%
FL	94,862	42%	22%	33%	2%	0%
ОН	76,362	43%	53%	3%	1%	0%
TX	71,645	14%	29%	53%	4%	0%
PA	65,206	43%	45%	10%	2%	0%
CO	54,161	64%	8%	23%	4%	1%
WI	34,275	47%	33%	15%	5%	1%
GA	31,468	40%	45%	10%	5%	0%
NC	31,193	61%	31%	4%	2%	1%
NY	30,708	10%	66%	22%	1%	0%
MN	26,066	44%	31%	8%	14%	3%
IL	24,354	7%	62%	29%	2%	0%
MA	24,331	45%	27%	23%	4%	0%
LA	21,055	17%	76%	3%	3%	0%
DC	19,543	3%	89%	8%	1%	0%
UT	19,078	86%	2%	8%	3%	1%
NJ	17,271	9%	66%	22%	3%	0%
MO	14,877	8%	85%	6%	1%	0%
OR	10,724	83%	4%	7%	3%	4%
IN	10,688	31%	63%	6%	1%	0%
ID	10,405	92%	1%	4%	2%	1%
NM	9,854	34%	3%	53%	2%	8%
DE	8,396	49%	41%	4%	5%	0%
HI	6,663	26%	2%	3%	68%	2%
NV	6,065	49%	23%	22%	4%	2%
MD	5,912	14%	79%	6%	1%	1%
SC	5,426	53%	43%	2%	1%	0%
OK	5,362	31%	34%	28%	3%	4%
	St	tate's Charter Sci	hool Enrollmen	t Less than 5,000) Students	
AR	4,988	64%	30%	3%	3%	0%
СТ	3,743	16%	60%	22%	1%	0%
AK	3,319	71%	2%	5%	3%	19%
KS	3,013	84%	5%	8%	1%	2%
TN	2,742	1%	97%	2%	0%	0%
RI	1,817	35%	16%	44%	4%	1%
IA	691	49%	32%	17%	2%	0%
NH	478	94%	1%	1%	3%	1%
MS	375	61%	34%	2%	2%	0%
WY	255	54%	1%	3%	2%	40%
VA	239	60%	36%	3%	0%	1%

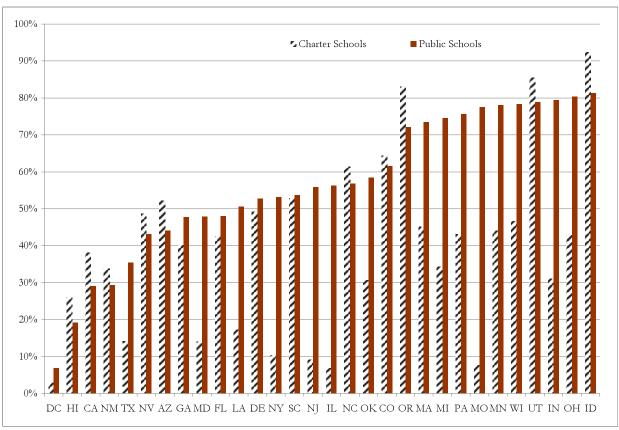


Figure A-1. White Proportion of All Students Enrolled in Charter Schools and Traditional Public Schools, 2007–08

Source: 2007-08 NCES Common Core of Data; sorted by traditional public school White percentage

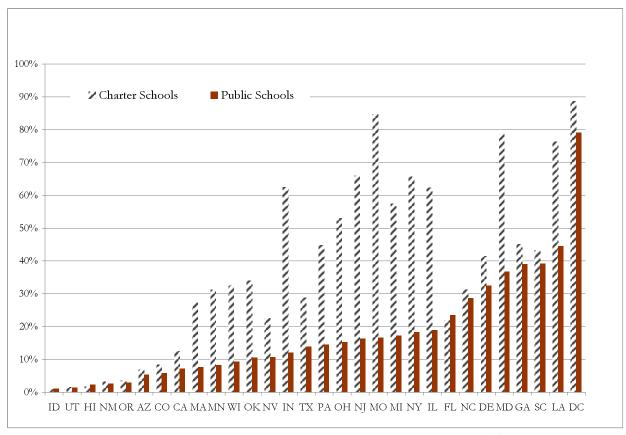


Figure A-2. Black Proportion of All Students Enrolled in Charter Schools and Traditional Public Schools, 2007–08

Source: 2007-08 NCES Common Core of Data; sorted by traditional public school Black percentage

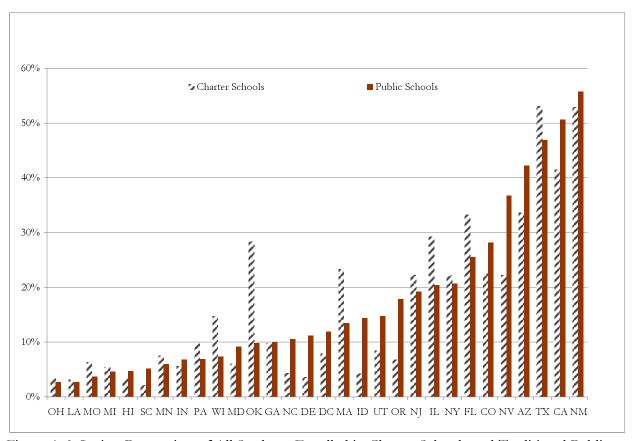


Figure A-3. Latino Proportion of All Students Enrolled in Charter Schools and Traditional Public Schools, 2007-08

Source: 2007-08 NCES Common Core of Data; sorted by traditional public school Latino percentage

Table A-6
Racial Composition of Charter and Regular Public Schools in Selected MSAs, 2007–08

Metropolitan Area		Charter		Trac	ditional P	ablic
	Latino	Black	White	Latino	Black	White
	%	%	%	%	%	%
Albuquerque, NM	54%	4%	31%	55%	4%	33%
Atlanta-Sandy Springs-Marietta, GA	11%	44%	38%	12%	40%	43%
Boston-Cambridge-Quincy, MA-NH	23%	32%	40%	12%	8%	73%
Chicago-Naperville-Joliet, IL-IN-WI	27%	64%	7%	26%	22%	46%
Cincinnati-Middletown, OH-KY-IN	1%	78%	21%	2%	15%	81%
Cleveland-Elyria-Mentor, OH	8%	70%	22%	5%	27%	67%
Colorado Springs, CO	18%	8%	70%	17%	10%	67%
Columbus, OH	2%	42%	54%	3%	20%	74%
Dallas-Fort Worth-Arlington, TX	35%	34%	24%	36%	18%	41%
Dayton, OH	1%	74%	25%	2%	17%	79%
Denver-Aurora, CO	24%	10%	62%	31%	8%	56%
Detroit-Warren-Livonia, MI	5%	72%	21%	3%	26%	67%
Fresno, CA	53%	10%	30%	57%	6%	23%
Honolulu, HI	3%	2%	26%	5%	2%	19%
Houston-Sugar Land-Baytown, TX	49%	37%	10%	42%	20%	32%
Indianapolis-Carmel, IN	5%	62%	33%	6%	19%	72%
Kansas City, MO-KS	10%	79%	9%	9%	17%	70%
Los Angeles-Long Beach-Santa Ana, CA	52%	17%	24%	60%	7%	20%
Miami-Fort Lauderdale-Pompano Beach,						
FL	50%	27%	21%	43%	31%	24%
Milwaukee-Waukesha-West Allis, WI	20%	50%	24%	11%	23%	61%
Minneapolis-St. Paul-Bloomington, MN-WI	8%	37%	35%	6%	12%	73%
New Orleans-Metairie-Kenner, LA	4%	82%	11%	6%	45%	46%
New York-Northern New Jersey-Long						
Island, NY-NJ-PA	26%	66%	5%	27%	20%	42%
Orlando-Kissimmee, FL	36%	14%	47%	30%	21%	45%
Philadelphia-Camden-Wilmington, PA-NJ-						
DE-MD	11%	53%	33%	9%	27%	59%
Phoenix-Mesa-Scottsdale, AZ	33%	8%	52%	42%	6%	46%
Portland-Vancouver-Beaverton, OR-WA	6%	8%	81%	15%	5%	71%
Prescott, AZ	12%	1%	80%	24%	1%	71%
SacramentoArden-ArcadeRoseville, CA	24%	14%	54%	24%	11%	49%
San Antonio, TX	77%	17%	5%	62%	7%	28%
San Diego-Carlsbad-San Marcos, CA	42%	12%	36%	45%	7%	35%
San Francisco-Oakland-Fremont, CA	41%	23%	24%	29%	11%	33%
San Jose-Sunnyvale-Santa Clara, CA	49%	4%	33%	38%	3%	26%
Santa Rosa-Petaluma, CA	28%	3%	63%	36%	2%	55%
Tampa-St. Petersburg-Clearwater, FL	16%	24%	58%	20%	18%	58%
Toledo, OH	3%	33%	63%	6%	17%	76%
Tucson, AZ	41%	6%	45%	50%	5%	39%

Table A-6 (cont.)
Racial Composition of Charter and Regular Public Schools in Selected MSAs, 2007–08

Washington-Arlington-Alexandria, DC-VA-MD-WV 8% 88% 4% 17% 31% 42 Between 10 and 20 charter schools in MSA Akron, OH 1% 59% 39% 1% 17% 80 Albany-Schenectady-Troy, NY 9% 73% 14% 4% 11% 81 Appleton, WI 3% 3% 82% 4% 2% 87 Austin-Round Rock, TX 39% 20% 37% 42% 10% 43 Baltimore-Towson, MD 7% 82% 10% 4% 37% 53 Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63%
Akron, OH 1% 59% 39% 1% 17% 80 Albany-Schenectady-Troy, NY 9% 73% 14% 4% 11% 81 Appleton, WI 3% 3% 82% 4% 2% 87 Austin-Round Rock, TX 39% 20% 37% 42% 10% 43 Baltimore-Towson, MD 7% 82% 10% 4% 37% 53 Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA
Albany-Schenectady-Troy, NY 9% 73% 14% 4% 11% 81 Appleton, WI 3% 3% 82% 4% 2% 87 Austin-Round Rock, TX 39% 20% 37% 42% 10% 43 Baltimore-Towson, MD 7% 82% 10% 4% 37% 53 Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC
Appleton, WI 3% 3% 82% 4% 2% 87 Austin-Round Rock, TX 39% 20% 37% 42% 10% 43 Baltimore-Towson, MD 7% 82% 10% 4% 37% 53 Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA
Austin-Round Rock, TX 39% 20% 37% 42% 10% 43 Baltimore-Towson, MD 7% 82% 10% 4% 37% 53 Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 26% 70 Gainesville, FL
Baltimore-Towson, MD 7% 82% 10% 4% 37% 53 Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Boise City-Nampa, ID 4% 1% 93% 16% 2% 79 Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Bradenton-Sarasota-Venice, FL 11% 10% 78% 19% 13% 66 Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Buffalo-Niagara Falls, NY 8% 64% 26% 5% 17% 75 Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Cabton-Massilon, OH 1% 35% 63% 1% 10% 88 Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Cape Coral-Fort Meyers, FL 25% 10% 63% 31% 15% 53 Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Charlotte-Gastonia-Concord, NC-SC 2% 25% 69% 12% 32% 53 Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Chico, CA 11% 2% 81% 18% 3% 67 Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Durham, NC 4% 49% 46% 15% 38% 42 Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Eureka-Arcata-Fortuna, CA 6% 3% 80% 12% 2% 69 Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Flint, MI 3% 60% 36% 2% 26% 70 Gainesville, FL 7% 34% 58% 6% 34% 56
Gainesville, FL 7% 34% 58% 6% 34% 56
·
Grand Rapids-Wyoming, MI 12% 23% 61% 10% 11% 76
22/0 25/0 01/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 10/0 11/0 11/0 10/0 11/0 1
Lake Havasu City-Kingman, AZ 13% 1% 84% 24% 2% 70
Lakeland-Winter Haven, FL 16% 21% 61% 23% 22% 53
Little Rock-North Little Rock, AR 4% 39% 52% 5% 34% 60
Madison, WI 19% 19% 55% 7% 10% 78
Modesto, CA 28% 4% 62% 53% 4% 36
Oklahoma City, OK 32% 34% 28% 13% 15% 60
Pittsburgh, PA 2% 25% 72% 1% 13% 84
Provo-Orem, UT 8% 1% 87% 11% 1% 85
Raleigh-Cary, NC 3% 30% 63% 12% 26% 57
Redding, CA 4% 1% 90% 9% 2% 79
St. Louis, MO-IL 3% 87% 9% 2% 27% 69
Salt Lake City, UT 10% 2% 84% 20% 2% 71
Santa Cruz-Watsonville, CA 38% 2% 55% 54% 1% 41
Sierra Vista-Douglas, AZ 67% 5% 26% 46% 6% 44
Stockton, CA 37% 12% 38% 44% 10% 26
Truckee-Grass Valley, CA 27% 13% 57% 13% 1% 83
Youngstown-Warren-Boardman, OH-PA 5% 66% 28% 2% 15% 83
Yuba City, CA 19% 7% 64% 33% 3% 46

Table A-7 White Over-representation in Charter Schools, Top 15 MSAs, 2007–08

Metropolitan Area	Charter School	Public School	White Charter Over-
	White %	White %	representation
Riverside-San Bernardino-Ontario, CA	46%	27%	170.4%
Honolulu, HI	26%	19%	136.8%
Fresno, CA	30%	23%	130.4%
San Jose-Sunnyvale-Santa Clara, CA	33%	26%	126.9%
Los Angeles-Long Beach-Santa Ana, CA	24%	20%	120.0%
Tucson, AZ	45%	39%	115.4%
Santa Rosa-Petaluma, CA	63%	55%	114.5%
Portland-Vancouver-Beaverton, OR-WA	81%	71%	114.1%
Phoenix-Mesa-Scottsdale, AZ	52%	46%	113.0%
Prescott, AZ	80%	71%	112.7%
Denver-Aurora, CO	62%	56%	110.7%
SacramentoArden-ArcadeRoseville, CA	54%	49%	110.2%
Colorado Springs, CO	70%	67%	104.5%
Orlando-Kissimmee, FL	47%	45%	104.4%
San Diego-Carlsbad-San Marcos, CA	36%	35%	102.9%

*Table A-8*Black Overrepresentation in Charter Schools, Top 15 MSAs, 2007–08

Metropolitan area	Charter	Public	Black Charter
	School	School	Over-
	Black %	Black %	representation
Cincinnati-Middletown, OH-KY-IN	78%	15%	520.0%
Kansas City, MO-KS	79%	17%	464.7%
Dayton, OH	74%	17%	435.3%
Boston-Cambridge-Quincy, MA-NH	32%	8%	400.0%
New York-Northern New Jersey-Long Island, NY-NJ-PA	66%	20%	330.0%
Indianapolis-Carmel, IN	62%	19%	326.3%
Minneapolis-St. Paul-Bloomington, MN-WI	37%	12%	308.3%
Chicago-Naperville-Joliet, IL-IN-WI	64%	22%	290.9%
Washington-Arlington-Alexandria, DC-VA-MD-WV	88%	31%	283.9%
Detroit-Warren-Livonia, MI	72%	26%	276.9%
Cleveland-Elyria-Mentor, OH	70%	27%	259.3%
San Antonio, TX	17%	7%	242.9%
Los Angeles-Long Beach-Santa Ana, CA	17%	7%	242.9%
Milwaukee-Waukesha-West Allis, WI	50%	23%	217.4%
Columbus, OH	42%	20%	210.0%

*Table A-9*Latino Overrepresentation in Charter Schools, Top 15 MSAs, 2007–08

Metropolitan Area	Charter	Public	Latino Charter
	School	School	Over-
	Latino %	Latino %	representation
Boston-Cambridge-Quincy, MA-NH	23%	12%	191.7%
Milwaukee-Waukesha-West Allis, WI	20%	11%	181.8%
Detroit-Warren-Livonia, MI	5%	3%	166.7%
Cleveland-Elyria-Mentor, OH	8%	5%	160.0%
San Francisco-Oakland-Fremont, CA	41%	29%	141.4%
Minneapolis-St. Paul-Bloomington, MN-WI	8%	6%	133.3%
San Jose-Sunnyvale-Santa Clara, CA	49%	38%	128.9%
San Antonio, TX	77%	62%	124.2%
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	11%	9%	122.2%
Orlando-Kissimmee, FL	36%	30%	120.0%
Houston-Sugar Land-Baytown, TX	49%	42%	116.7%
Miami-Fort Lauderdale-Pompano Beach, FL	50%	43%	116.3%
Kansas City, MO-KS	10%	9%	111.1%
Colorado Springs, CO	18%	17%	105.9%
Chicago-Naperville-Joliet, IL-IN-WI	27%	26%	103.8%

Table A-10 Percentage of Charter School Students by Location and State, 2007–08

_	Large	Smaller	Large	Smaller	Town -	City	Suburb	White
State	City	City	Suburb	Suburb	Rural			(%)
DC	100%	0%	0%	0%	0%	100%	0%	3%
IL	92%	2%	2%	1%	2%	94%	4%	7%
MO	96%	0%	0%	0%	4%	96%	0%	8%
NJ	23%	28%	41%	6%	1%	51%	48%	9%
NY	75%	14%	4%	0%	7%	89%	4%	10%
LA	0%	87%	0%	0%	13%	87%	0%	13%
MD	76%	5%	15%	1%	3%	81%	16%	14%
TX	73%	10%	9%	1%	7%	83%	10%	14%
HI	31%	0%	6%	6%	57%	31%	12%	26%
OK	95%	0%	5%	0%	0%	95%	5%	31%
IN	54%	32%	4%	1%	10%	85%	5%	31%
NM	46%	10%	17%	0%	26%	56%	17%	34%
MI	28%	24%	29%	6%	13%	52%	35%	34%
CA	39%	12%	24%	5%	20%	51%	29%	38%
GA	8%	22%	47%	5%	19%	29%	52%	40%
FL	6%	19%	40%	6%	28%	25%	46%	42%
ОН	52%	20%	12%	1%	14%	72%	14%	43%
PA	48%	8%	28%	1%	15%	56%	29%	43%
MN	52%	9%	18%	0%	20%	61%	19%	44%
MA	21%	32%	39%	2%	6%	53%	41%	45%
WI	51%	22%	2%	5%	20%	73%	7%	47%
NV	38%	32%	10%	0%	20%	70%	10%	49%
DE	0%	47%	33%	0%	20%	47%	33%	49%
ΑZ	48%	9%	20%	3%	19%	58%	23%	52%
SC	0%	61%	9%	5%	25%	61%	14%	53%
NC	13%	23%	9%	3%	52%	36%	12%	61%
CO	20%	10%	30%	5%	36%	30%	34%	64%
OR	11%	10%	23%	2%	54%	21%	25%	83%
UT	0%	20%	41%	4%	35%	20%	45%	86%
ID	0%	42%	8%	3%	46%	42%	12%	92%
AK	28%	0%	0%	4%	68%	28%	4%	71%
AR	0%	46%	0%	0%	54%	46%	0%	64%
СТ	0%	93%	5%	0%	2%	93%	5%	16%
IA	0%	73%	0%	0%	27%	73%	0%	49%
KS	0%	31%	1%	0%	67%	31%	1%	84%
MS	0%	0%	0%	0%	100%	0%	0%	61%
NH	0%	0%	31%	21%	48%	0%	52%	94%
RI	0%	49%	42%	0%	10%	49%	42%	35%
TN	100%	0%	0%	0%	0%	100%	0%	1%
VA	0%	79%	21%	0%	0%	79%	21%	60%
WY	0%	0%	0%	0%	100%	0%	0%	54%

Source: 2007–08 NCES Common Core of Data; sorted by percentage of White students

Table A-11 Percentage of Traditional Public School Students by Location and State, 2007–08

State	Large City	Smaller City	Large Suburb	Smaller Suburb	Town / Rural	City	Suburb
DC	100%	0%	0%	0%	0%	100%	0%
HI	23%	0%	34%	7%	36%	23%	41%
CA	24%	20%	33%	7%	16%	44%	41%
NM	23%	11%	10%	3%	53%	34%	13%
TX	26%	15%	23%	3%	33%	41%	26%
NV	19%	18%	35%	0%	28%	38%	35%
AZ	36%	9%	19%	3%	33%	45%	22%
MS	0%	10%	6%	4%	79%	10%	10%
GA	3%	11%	37%	3%	46%	14%	40%
MD	8%	7%	50%	11%	24%	15%	60%
FL	8%	16%	43%	9%	24%	24%	52%
LA	0%	26%	12%	11%	51%	26%	23%
DE	0%	12%	41%	5%	43%	12%	46%
NY	36%	6%	35%	2%	21%	42%	37%
SC	0%	15%	19%	9%	57%	15%	28%
AK	32%	5%	0%	3%	61%	36%	3%
NJ	3%	6%	76%	3%	12%	9%	79%
IL	18%	12%	40%	5%	25%	30%	45%
NC	9%	16%	9%	7%	59%	25%	16%
OK	19%	2%	17%	2%	60%	21%	19%
VA	6%	17%	34%	4%	39%	23%	38%
AL	0%	21%	11%	6%	61%	21%	17%
CO	22%	11%	29%	6%	32%	33%	35%
CT	0%	26%	45%	11%	19%	26%	55%
AR	0%	25%	8%	3%	65%	25%	10%
WA	4%	23%	34%	10%	29%	27%	44%
TN	18%	13%	13%	4%	53%	30%	17%
RI	0%	31%	54%	0%	16%	31%	54%
OR	11%	21%	19%	5%	44%	32%	24%
KS	10%	15%	13%	1%	62%	25%	14%
MA	6%	14%	62%	5%	14%	19%	67%
MI	7%	16%	33%	7%	37%	23%	40%
NE	23%	11%	11%	1%	54%	34%	12%
PA	11%	7%	38%	7%	36%	18%	46%
MO	9%	8%	28%	3%	52%	17%	32%
MN	9%	10%	30%	2%	49%	19%	31%
WI	9%	17%	14%	11%	49%	26%	24%
UT	0%	17%	52%	3%	28%	17%	55%
IN	13%	14%	20%	4%	49%	27%	24%
ОН	11%	7%	36%	4%	42%	18%	41%
ID	0%	29%	7%	9%	56%	29%	16%
SD	0%	25%	0%	1%	73%	25%	1%
MT	0%	23%	0%	2%	75%	23%	2%
WY	0%	24%	0%	1%	74%	24%	1%
IA	0%	27%	6%	2%	65%	27%	8%
KY	16%	4%	12%	3%	66%	20%	14%
ND	0%	27%	0%	9%	64%	27%	9%
NH	0%	14%	9%	24%	53%	14%	32%
WV	0%	13%	0%	16%	71%	13%	16%
ME	0%	12%	0%	13%	75%	12%	13%
VT	0%	7%	0%	10%	83%	7%	10%

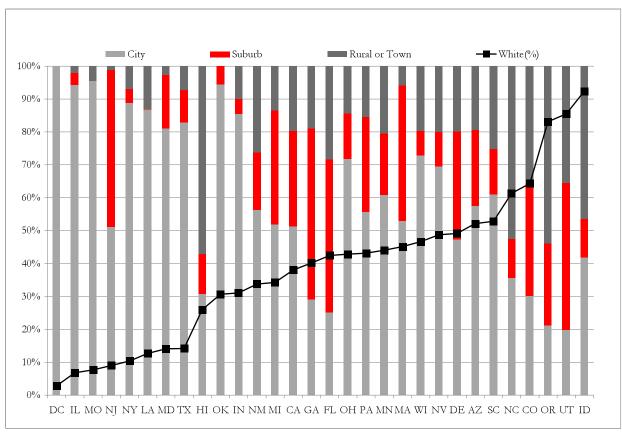


Figure A-4. Enrollment of Charter Students by Location and State, 2007–08 *Source*: 2007–08 NCES Common Core of Data

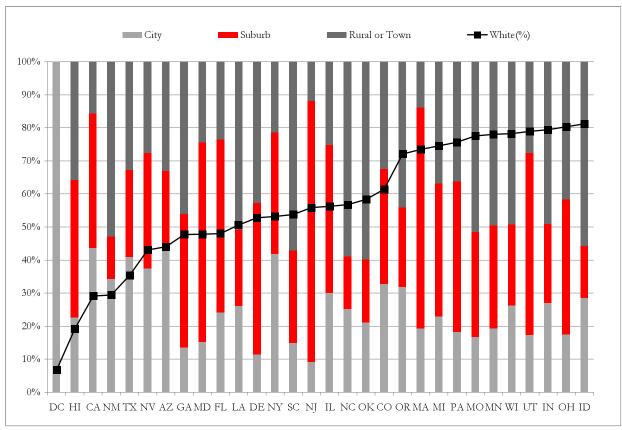


Figure A-5: Enrollment of Traditional Public School Students by Location and State, 2007–08 Source: 2007–08 NCES Common Core of Data

Table A-12
Percentage of Charter and Public School Students in Intensely Segregated Minority Schools, by Race-Ethnicity and by State, 2007–08

State	White Share of School Enrollment				90-100% Minority Charter School Enrollment Rate			90-100% Minority Public School Enrollment Rate		
-	Charter	Public	Charter-Public Difference ⁴⁹	White	Black	Latino	White	Black	Latino	
ΑZ	52	44	8	1	18	38	2	18	38	
CA	38	29	9	1	52	50	4	41	53	
CO	64	61	3	0	24	16	0	13	16	
DC	3	7	-4	18	96	79	7	91	82	
DE	49	53	-4	1	66	31	0	3	5	
FL	42	48	-6	2	42	34	1	32	28	
GA	40	48	-8	2	40	24	1	41	28	
HI	26	19	7	4	32	15	7	9	13	
ID	92	81	11	0	0	0	0	0	0	
IL	7	56	-49	36	96	96	1	60	45	
IN	31	79	-48	3	81	41	0	24	9	
LA	17	51	-33	5	83	49	1	36	9	
MA	45	73	-28	1	53	37	0	23	23	
MD	14	48	-34	8	90	34	1	51	33	
MI	34	75	-40	2	78	46	0	51	12	
MN	44	78	-34	2	77	55	0	12	8	
MO	8	78	-70	29	92	75	0	37	6	
NC	61	57	5	0	46	43	1	18	13	
NJ	9	56	-47	13	94	82	1	46	40	
NM	34	29	4	5	41	44	4	11	33	
NV	49	43	6	0	62	17	2	15	20	
NY	10	53	-43	8	84	78	1	62	57	
ОН	43	80	-37	2	64	13	0	34	5	
OK	31	58	-28	6	75	31	0	13	6	
OR	83	72	11	0	35	1	0	2	1	
PA	43	76	-32	1	69	57	0	42	24	
SC	53	54	-1	1	33	6	1	19	4	
TX	14	35	-21	10	82	79	3	38	52	
UT	86	79	7	0	1	3	0	1	0	
WI	47	78	-32	2	70	47	0	35	14	
		Sta	ate's Charter School	Enrollmer	t Less than	5,000 Stude	ents			
AK	71	55	17	1	3	2	1	3	2	
AR	64	67	-3	1	38	5	0	25	3	
СТ	16	66	-50	8	87	69	0	28	24	
IA	49	85	-36	0	0	0	0	1	0	
KS	84	73	11	0	0	0	0	6	8	
MS	61	46	15	0	0	0	1	46	9	
NH	94	92	2	0	0	0	0	0	0	
RI	35	70	-36	3	10	29	1	26	41	
TN	1	69	-68	100	100	100	0	42	9	
VA	60	59	1	4	85	33	0	15	4	
WY	54	84	-30	2	0	0	0	0	0	

⁴⁹ Due to rounding, numbers may not add up.

Table A-13
Charter and Traditional Public School Students in Intensely Segregated Minority Schools by MSA, 2007–08

	White Difference		
Metropolitan Area	(Charter-Public)	Charter	Public
Albuquerque, NM	-3%	38%	21%
Atlanta-Sandy Springs-Marietta, GA	-5%	22%	27%
Boston-Cambridge-Quincy, MA-NH	-33%	32%	7%
Chicago-Naperville-Joliet, IL-IN-WI	-39%	91%	29%
Cincinnati-Middletown, OH-KY-IN	-60%	67%	6%
Cleveland-Elyria-Mentor, OH	-44%	53%	14%
Colorado Springs, CO	3%	0%	0%
Columbus, OH	-19%	25%	6%
Dallas-Fort Worth-Arlington, TX	-17%	49%	23%
Dayton, OH	-55%	56%	8%
Denver-Aurora, CO	6%	11%	11%
Detroit-Warren-Livonia, MI	-45%	66%	18%
Fresno, CA	7%	23%	37%
Honolulu, HI	7%	32%	21%
Houston-Sugar Land-Baytown, TX	-22%	75%	35%
Indianapolis-Carmel, IN	-39%	47%	4%
Kansas City, MO-KS	-62%	85%	6%
Los Angeles-Long Beach-Santa Ana, CA	3%	49%	53%
Miami-Fort Lauderdale-Pompano Beach, FL	-3%	41%	42%
Milwaukee-Waukesha-West Allis, WI	-37%	55%	17%
Minneapolis-St. Paul-Bloomington, MN-WI	-37%	49%	4%
New Orleans-Metairie-Kenner, LA	-35%	76%	17%
New York-Northern New Jersey-Long Island, NY-			
NJ-PA	-37%	85%	32%
Orlando-Kissimmee, FL	2%	3%	9%
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	-26%	50%	17%
Phoenix-Mesa-Scottsdale, AZ	6%	16%	19%
Portland-Vancouver-Beaverton, OR-WA	10%	3%	0%
Prescott, AZ	9%	0%	0%
Riverside-San Bernardino-Ontario, CA	19%	6%	29%
SacramentoArden-ArcadeRoseville, CA	5%	18%	10%
San Antonio, TX	-23%	86%	31%
San Diego-Carlsbad-San Marcos, CA	1%	27%	24%
San Francisco-Oakland-Fremont, CA	-10%	53%	25%
San Jose-Sunnyvale-Santa Clara, CA	7%	31%	32%
Santa Rosa-Petaluma, CA	8%	9%	5%
Tampa-St. Petersburg-Clearwater, FL	0%	19%	4%
Toledo, OH	-14%	12%	4%
Tucson, AZ	7%	17%	24%
Washington-Arlington-Alexandria, DC-VA-MD-WV	-38%	91%	20%

Table A-13 (cont.)
Charter and Traditional Public School Students in Intensely Segregated Minority Schools by MSA, 2007–08

Albany-Schenectady-Troy, NY Appleton, WI Austin-Round Rock, TX Baltimore-Towson, MD -6 -6 -6 -6 -6 -7 -7 -7 -7 -7	7% (5% (5% (5% (4% (5% (5% (5% (5% (5% (5% (5% (5% (5% (5	33% 77%	3% 2% 0% 17% 20%
Appleton, WI Austin-Round Rock, TX Baltimore-Towson, MD -5 -6 -6 -6 -6 -6 -6 -6 -6 -6	5% 5% 4% 4% 2%	0% 33% 77%	0% 17% 20%
Austin-Round Rock, TX Baltimore-Towson, MD -4	5% 3 4% 4% 2%	33% 77%	17% 20%
Baltimore-Towson, MD -4	4% 4% 2%	77%	20%
	4% 2%		
Boise City-Nampa, ID	2%	0%	
			0%
Bradenton-Sarasota-Venice, FL	201	0%	1%
Buffalo-Niagara Falls, NY -4	.9%	43%	8%
Cabton-Massilon, OH -2	25%	0%	0%
Cape Coral-Fort Meyers, FL	0%	3%	2%
Charlotte-Gastonia-Concord, NC-SC 10	6%	13%	14%
Chico, CA	4%	0%	0%
Durham, NC 4	1% 2	21%	18%
Eureka-Arcata-Fortuna, CA	1%	0%	3%
Flint, MI -3	4%	29%	12%
Gainesville, FL 2	2%	16%	4%
Grand Rapids-Wyoming, MI -1	4%	15%	6%
Lake Havasu City-Kingman, AZ	4%	0%	1%
Lakeland-Winter Haven, FL 9	0%	0%	0%
Little Rock-North Little Rock, AR -8	8%	11%	12%
Madison, WI -2	22%	0%	0%
Modesto, CA 20	6%	5%	8%
Oklahoma City, OK -3	2%	40%	5%
Pittsburgh, PA -1	2%	9%	2%
Provo-Orem, UT	2%	0%	0%
Raleigh-Cary, NC 6	5% 2	20%	1%
Redding, CA 1	1%	0%	0%
St. Louis, MO-IL -6	0%	33%	13%
Salt Lake City, UT 1:	3%	1%	0%
Santa Cruz-Watsonville, CA	3%	19%	41%
Sierra Vista-Douglas, AZ -1	8%	50%	24%
Stockton, CA 12	2%	11%	26%
Truckee-Grass Valley, CA -2	.7%	7%	0%
Youngstown-Warren-Boardman, OH-PA -5	4%	41%	4%
Yuba City, CA	8%	0%	0%

Table A-14
Percentage of Charter and Public School Students in Intensely Segregated White Schools, by Race-Ethnicity and by State, 2007–08

and by S	State, 2007–	08							
State	White	Share of Sch	nool Enrollment		0% White		90–100% White Public		
				School Enrollment Rate			School Enrollment Rate		
	Charter	Public	Charter-Public Difference	White	Black	Latino	White	Black	Latino
AZ	52	44	8	7	1	0	2	0	0
CA	38	29	9	7	0	0	2	0	0
CO	64	61	3	11	1	1	8	1	1
DC	3	7	-4	0	0	0	0	0	0
DE	49	53	-4	7	0	4	1	0	0
FL	42	48	-6	9	0	1	7	0	0
GA	40	48	-8	1	0	0	12	0	2
HI	26	19	7	0	0	0	0	0	0
ID	92	81	11	80	69	59	39	24	9
IL	7	56	-49	0	0	0	39	1	2
IN	31	79	-48	28	0	1	62	4	14
LA	17	51	-33	0	0	0	19	1	5
MA	45	73	-28	24	1	1	54	7	7
MD	14	48	-34	0	0	0	22	1	2
MI	34	75	-40	30	0	3	58	4	19
MN	44	78	-34	40	1	4	46	6	12
MO	8	78	-70	0	0	0	55	5	17
NC	61	57	5	20	2	3	16	1	3
NJ	9	56	-47	12	0	0	21	1	2
NM	34	29	4	0	0	0	0	0	0
NV	49	43	6	0	0	0	1	0	0
NY	10	53	-43	0	0	0	46	2	2
ОН	43	80	-37	20	1	4	70	6	24
OK	31	58	-28	0	0	0	2	0	0
OR	83	72	11	47	10	17	16	3	3
PA	43	76	-32	4	0	0	62	7	9
SC	53	54	-1	14	1	5	5	0	1
TX	14	35	-21	1	0	0	4	0	0
UT	86	79	7	34	24	10	40	16	9
WI	47	78	-32	25	1	2	56	6	14
			e's Charter School Er	nrollment L	ess than 5,	000 Student			
AK	71	55	17	16	0	9	2	0	0
AR	64	67	-3	68	2	35	45	2	8
CT	16	66	-50	13	0	0	41	3	4
IA	49	85	-36	21	0	0	62	14	15
KS	84	73	11	36	10	9	40	5	6
MS	61	46	15	0	0	0	16	1	5
NH	94	92	2	81	60	67	84	46	36
RI	35	70	-36	0	0	0	59	8	5
TN	1	69	-68	0	0	0	52	3	13
VA	60	59	1	68	9	33	18	1	2
WY	54	84	-30	0	0	0	44	18	15

Table A-15

Charter and Traditional Public School Students in Intensely Segregated White Schools by MSA, 2007-08

	Difference in Percentage of White Students	Percent Students 100% Whit	in 90–	
Metropolitan Area	(Charter-Public)	Charter	Public	
Albuquerque, NM	-3%	0%	0%	
Atlanta-Sandy Springs-Marietta, GA	-5%	0%	4%	
Boston-Cambridge-Quincy, MA-NH	-33%	11%	43%	
Chicago-Naperville-Joliet, IL-IN-WI	-39%	0%	9%	
Cincinnati-Middletown, OH-KY-IN	-60%	4%	57%	
Cleveland-Elyria-Mentor, OH	-44%	1%	49%	
Colorado Springs, CO	3%	0%	0%	
Columbus, OH	-19%	7%	36%	
Dallas-Fort Worth-Arlington, TX	-17%	0%	1%	
Dayton, OH	-55%	2%	47%	
Denver-Aurora, CO	6%	6%	5%	
Detroit-Warren-Livonia, MI	-45%	9%	31%	
Fresno, CA	7%	1%	0%	
Honolulu, HI	7%	0%	0%	
Houston-Sugar Land-Baytown, TX	-22%	0%	0%	
Indianapolis-Carmel, IN	-39%	7%	36%	
Kansas City, MO-KS	-62%	1%	22%	
Los Angeles-Long Beach-Santa Ana, CA	3%	1%	0%	
Miami-Fort Lauderdale-Pompano Beach, FL	-3%	0%	0%	
Milwaukee-Waukesha-West Allis, WI	-37%	1%	26%	
Minneapolis-St. Paul-Bloomington, MN-WI	-37%	12%	29%	
New Orleans-Metairie-Kenner, LA	-35%	0%	5%	
New York-Northern New Jersey-Long Island, NY-				
NJ-PA	-37%	0%	10%	
Orlando-Kissimmee, FL	2%	6%	0%	
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	-26%	0%	17%	
Phoenix-Mesa-Scottsdale, AZ	6%	3%	1%	
Portland-Vancouver-Beaverton, OR-WA	10%	29%	11%	
Prescott, AZ	9%	0%	0%	
Riverside-San Bernardino-Ontario, CA	19%	0%	0%	
SacramentoArden-ArcadeRoseville, CA	5%	5%	3%	
San Antonio, TX	-23%	0%	0%	
San Diego-Carlsbad-San Marcos, CA	1%	0%	0%	
San Francisco-Oakland-Fremont, CA	-10%	0%	1%	
San Jose-Sunnyvale-Santa Clara, CA	7%	0%	0%	
Santa Rosa-Petaluma, CA	8%	7%	0%	
Tampa-St. Petersburg-Clearwater, FL	0%	17%	4%	
Toledo, OH	-14%	1%	45%	

Table A-15 (cont.)

Charter and Traditional Public School Students in Intensely Segregated White Schools by MSA,

2007-08

Tucson, AZ	7%	1%	0%
Washington-Arlington-Alexandria, DC-VA-MD-WV	-38%	0%	2%
Between 10 and 20 charter se	chools in MSA		
Akron, OH	-41%	8%	53%
Albany-Schenectady-Troy, NY	-67%	0%	57%
Appleton, WI	-5%	0%	0%
Austin-Round Rock, TX	-6%	5%	0%
Baltimore-Towson, MD	-44%	0%	14%
Boise City-Nampa, ID	14%	0%	0%
Bradenton-Sarasota-Venice, FL	12%	0%	8%
Buffalo-Niagara Falls, NY	-49%	0%	51%
Cabton-Massilon, OH	-25%	0%	0%
Cape Coral-Fort Meyers, FL	10%	1%	1%
Charlotte-Gastonia-Concord, NC-SC	16%	0%	3%
Chico, CA	14%	0%	0%
Durham, NC	4%	0%	0%
Eureka-Arcata-Fortuna, CA	11%	0%	3%
Flint, MI	-34%	0%	46%
Gainesville, FL	2%	13%	7%
Grand Rapids-Wyoming, MI	-14%	17%	48%
Lake Havasu City-Kingman, AZ	14%	0%	2%
Lakeland-Winter Haven, FL	9%	0%	0%
Little Rock-North Little Rock, AR	-8%	24%	26%
Madison, WI	-22%	0%	0%
Modesto, CA	26%	0%	0%
Oklahoma City, OK	-32%	0%	1%
Pittsburgh, PA	-12%	0%	67%
Provo-Orem, UT	2%	0%	0%
Raleigh-Cary, NC	6%	2%	0%
Redding, CA	11%	0%	0%
St. Louis, MO-IL	-60%	0%	34%
Salt Lake City, UT	13%	49%	25%
Santa Cruz-Watsonville, CA	13%	15%	2%
Sierra Vista-Douglas, AZ	-18%	0%	3%
Stockton, CA	12%	0%	0%
Truckee-Grass Valley, CA	-27%	33%	0%
Youngstown-Warren-Boardman, OH-PA	-54%	0%	66%
Yuba City, CA	18%	0%	0%

Table A-16 Racial Composition of Schools of the Average Traditional Public School Student, by Race-Ethnicity, 2007-08

	Racial Composition of Public School Attended by Average						
Percent Race in	White	Black		Asian	American		
Each School	Student	Student	Latino Student	Student	Indian Student		
% White	76	30	27	44	47		
% Black	9	50	12	12	7		
% Latino	10	15	55	21	13		
% Asian	4	3	5	23	3		
% American Indian	1	0.5	1	1	29		
Total	100	98.5	100	101	99		

Source: 2007–08 NCES Common Core of Data; Note: Totals may not add to 100 due to rounding.

Table A-17 White Exposure in Public and Charter Schools, by State, 2007–08

State	Percent White		White Isolation		White Exp Black		White Exposure to Latinos	
	Charter	Public	Charter	Public	Charter	Public	Charter	Public
AZ	52	44	69	63	5	5	19	26
CA	38	29	62	53	7	5	23	30
CO	64	61	75	73	5	4	15	19
DC	3	7	27	46	51	36	18	11
DE	49	53	73	59	16	28	3	9
FL	42	48	63	65	13	15	21	17
GA	40	48	59	67	27	22	8	8
HI	26	19	44	27	2	4	4	6
ID	92	81	93	84	1	1	4	12
IL	7	56	40	79	33	7	20	10
IN	31	79	74	88	18	6	6	5
LA	17	51	57	70	35	26	4	2
MA	45	73	73	84	12	4	11	7
MD	14	48	60	71	27	17	10	6
MI	34	75	75	87	16	6	5	4
MN	44	78	82	84	8	5	4	5
MO	8	78	32	87	57	8	8	3
NC	61	57	80	69	14	19	3	9
NJ	9	56	47	74	25	8	20	10
NM	34	29	52	45	3	3	39	45
NV	49	43	64	56	9	8	20	26
NY	10	53	43	81	38	6	15	8
OH	43	80	76	90	19	7	3	2
OK	31	58	55	65	16	7	21	8
OR	83	72	87	77	2	2	6	14
PA	43	76	76	87	16	6	5	4
SC	53	54	68	65	28	28	2	5
TX	14	35	45	59	15	10	31	26
UT	86	79	87	83	2	1	7	11
WI	47	78	77	86	9	4	8	5
A T 7					t Less than 5			
AK	71	55	80	69	2	4	5	6
AR	64	67	84	79	11	12	3	7
CT	16	66	55	80	23	6	17	9
IA	49	85	59	88	27	4	12	5
KS	84	73	87	81	4	6	7	9
MS	61	46	61	68	34	28	2	2
NH	94	92	95	93	1	2	1	3
RI	35	70	61	85	10	5	23	7
TN	1	69	5	84	92	10	3	4
VA	60	59	84	70	12	18	2	7
WY	54	84	83	86	2	1	4	9

*Table A-18*Minority Isolation in Public and Charter Schools, by Race/Ethnicity and by State, 2007–08

State	Black Is		Latino Isolation		
	(Black/Black	• /	(Latino/Latin		
	Charter	Public	Charter	Public	
AZ	14	9	57	62	
CA	39	20	63	68	
CO	32	19	45	49	
DC	93	88	32	41	
DE	75	39	4	23	
FL	52	46	58	48	
GA	65	63	27	29	
HI	3	7	5	7	
ID	2	3	6	28	
IL	79	65	58	56	
IN	87	48	19	22	
LA	87	67	18	10	
MA	54	29	47	41	
MD	91	64	34	27	
MI	87	65	39	23	
MN	78	26	48	17	
MO	90	58	33	15	
NC	64	48	16	20	
NJ	78	47	39	47	
NM	9	5	65	68	
NV	64	18	35	50	
NY	77	50	43	48	
OH	81	60	15	15	
OK	72	34	57	28	
OR	40	16	21	33	
PA	76	55	47	36	
SC	63	56	3	13	
TX	64	34	75	67	
UT	3	3	19	30	
WI	78	50	56	27	
		er School Enrollment L			
AK	4	10	7	12	
AR	71	58	5	27	
CT	72	36	28	38	
IA	49	19	46	22	
KS	16	27	21	38	
MS	34	72	2	5	
NH	4	5	1	11	
RI	21	20	59	49	
TN	97	64	3	15	
VA	78	50	3	23	
WY	2	4	4	17	

Table A-19
Minority Student Exposure to White Students in Public and Charter Schools, by Race-Ethnicity and State, 2007–08

State	Black/White	e Exposure	Latino/White Exposure		
_	Charter	Public	Charter	Public	
AZ	41	39	30	27	
CA	20	20	21	17	
CO	38	43	42	41	
DC	2	3	7	6	
DE	19	46	45	43	
FL	25	31	27	31	
GA	24	27	32	37	
HI	26	29	33	23	
ID	92	81	90	69	
IL	4	19	5	27	
IN	9	39	34	56	
LA	8	29	22	46	
MA	20	39	21	39	
MD	5	23	24	29	
MI	10	28	31	58	
MN	12	50	24	60	
MO	5	36	9	64	
NC	28	37	36	46	
NJ	3	26	8	28	
NM	29	35	25	23	
NV	19	33	44	31	
NY	6	18	7	20	
HC	16	35	45	62	
ЭK	14	41	22	45	
OR	50	55	71	57	
PA	16	32	22	41	
SC	34	38	58	51	
ГХ	8	26	8	20	
UT	80	67	74	61	
WI	13	34	26	55	
	State's Charter Sch	nool Enrollment Less th	an 5,000 Students		
AK	72	53	74	54	
AR	23	35	61	55	
СТ	6	32	13	35	
IA	42	67	34	66	
KS	69	51	71	47	
MS	61	26	61	53	
NH	90	83	93	81	
RI	23	39	18	29	
ľN	1	29	2	54	
VA	19	39	59	45	
WY	88	79	78	78	

Table A-20 Alternate Calculations of Percentage of Low-Income Charter School Students, 2007–08

		n Charter Scho	
	Schools reporting 0 or more FRL students	All schools	Schools with 1 or more FRL students
USA	50%	37%	52%
AK	15%	15%	34%
AR	44%	44%	52%
ΑZ	45%	35%	45%
CA	52%	39%	55%
CO	26%	23%	26%
CT	60%	60%	60%
DC	68%	39%	68%
DE	31%	29%	31%
FL	34%	34%	35%
GA	43%	43%	47%
HI	22%	22%	22%
IA	71%	71%	71%
ID	9%	9%	27%
IL	30%	4%	30%
IN	64%	64%	64%
KS	30%	30%	30%
LA	78%	9%	78%
MA	44%	44%	45%
MD	65%	64%	65%
MI	57%	57%	60%
MN	58%	56%	58%
MO	79%	79%	79%
MS	38%	38%	38%
NC	54%	14%	54%
NH	4%	4%	15%
NJ	68%	66%	68%
NM	56%	45%	56%
NV	25%	9%	25%
NY	75%	75%	75%
OK	68%	68%	68%
OR	22%	22%	33%
PA	57%	10%	57%
RI	62%	62%	62%
SC	38%	32%	38%
TN	60%	58%	60%
TX	64%	64%	66%
UT	29%	17%	29%
VA	34%	34%	34%
WI	52%	52%	54%
WY	45%	45%	45%

Table A-21 Comparison of States' Percentage of Low-Income Students among Charter and Traditional Public Schools, 2007–08

	Charter school	S	Traditional Public Schools		
State	Number of schools	% FRL	Number of schools	% FRL	
AZ	336*	45%	1,300	41%	
CA	483*	55%	7,592	52%	
CO	111*	26%	1,506	35%	
DC	42*	68%	126	61%	
DE	14	31%	158	39%	
FL	297	35%	2,764	46%	
GA	54	47%	2,093	51%	
HI	27	22%	254	38%	
ID	12*	27%	566	39%	
IL	3*	30%	3,343	47%	
IN	40	64%	1,833	39%	
LA	51	78%	1,260	63%	
MA	60	45%	1,698	29%	
MD	23	65%	1,275	33%	
MI	249	60%	3,072	36%	
MN	155	58%	1,477	31%	
MO	39	79%	2,096	39%	
NC	23*	54%	1,615	45%	
NJ	54	68%	2,194	28%	
NM	48*	56%	714	62%	
NV	9*	25%	526	40%	
NY	93	75%	4,199	44%	
OK	15	68%	1,767	55%	
OR	57*	33%	1,134	43%	
PA	33*	57%	2,791	34%	
SC	23*	38%	1,089	52%	
TX	209	66%	6,790	49%	
UT	29*	29%	710	33%	
WI	180	54%	1,938	31%	

Source: 2007–08 NCES Common Core of Data; Note: * indicates that less than 90% of charter schools in state provide FRL data

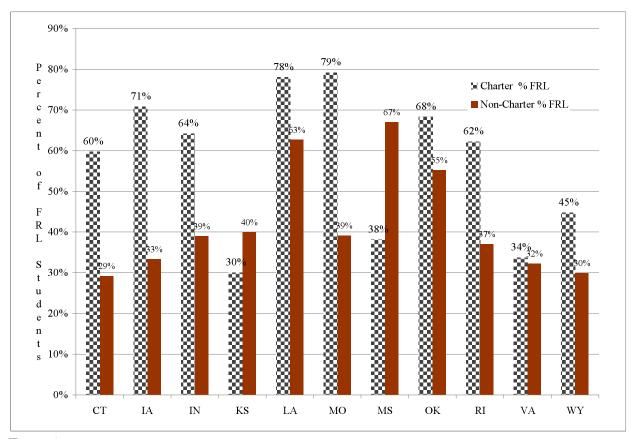


Figure A-6
Percentage of Students Who Received Free or Reduced Price Lunch for Selected States, 2007–08
Source: 2007–08 NCES Common Core of Data

Table A-22 Relationship of School Lunch Program and Segregation among Charter Schools, 2007–08

	_	er Schools Reporti		Charter Schools Missing FRL data				
	Number % Students at		% Students at	Number	% Students at	% Students at 90-		
	of	0-10% White			0-10% White	100% White		
	Students	Schools	Schools	of Students	Schools	Schools		
USA	870,710	40%	6%	322,498	28%	12%		
AK	1,431	26%	5%	1,888		18%		
AR	4,231	7%	43%	757		64%		
AZ	76,429	17%	2%	22,299	6%	10%		
CA	169,810	34%	2%	68,416	7%	4%		
CO	47,537	6%	7%	6,624		11%		
СТ	3,743	62%	2%					
DC	11,296	96%		8,247	95%			
DE	7,884	41%	4%	512				
FL	94,124	17%	4%	738		6%		
GA	29,024	19%		2,444		4%		
HI	6,563	23%		100	100%			
IA	691		10%					
ID	3,622		54%	6,783		91%		
IL	3,345	23%		21,009	93%			
IN	10,688	47%	9%					
KS	3,013		32%					
LA	21,055	68%						
MA	24,053	25%	11%	278		100%		
MD	5,834	68%						
MI	93,661	49%	9%	5,061	17%	59%		
MN	25,024	39%	16%	1,042	7%	77%		
MO	14,877	80%						
MS	375							
NC	8,054	36%		23,139	6%	18%		
NH	133		100%	345		71%		
NJ	16,925	82%	1%	346	70%	30%		
NM	7,852	33%		2,002	8%			
NV	2,038	27%		4,027	23%			
NY	30,377	72%		331	81%			
OK	5,362	21%		76,362	35%	9%		
OR	7,390	2%	24%	3,334		82%		
PA	11,136	60%	2%	54,070	36%	2%		
RI	1,817	11%						
SC	4,664	16%	9%	762	21%			
TN	2,652	100%		90	100%			
TX	69,851	77%	0.20%	1,794				
UT	10,815	1%	27%	8,263	1%	35%		
VA	239	31%	45%					
WI	32,840	36%	12%	1,435		14%		
WY	255	36%						

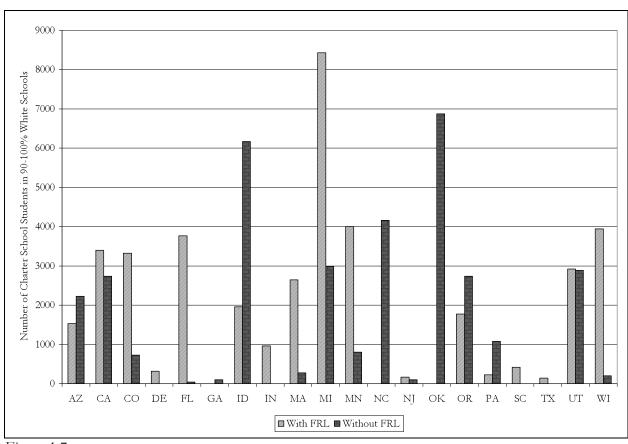


Figure A-7
Number of Students in Segregated White Charter Schools, by State and FRL Reporting Status Source: 2007–08 NCES Common Core of Data

Table A-23
Alternate Student Poverty Concentration, Charter and Traditional Public Schools, 2007–08

	School low-			Percentage of All
	income	Total	Total low-	Students in Each FRL
	percentage	students	income students	Category
	0-25%	242,260	25,863	27%
Charter	26-50%	199,091	74,668	22%
Schools	51-75%	224,627	143,021	25%
	76-100%	245,343	213,475	27%
	Total	911,321	457,027	
	0-25%	13,585,114	1,690,764	31%
Traditional	26-50%	13,502,972	5,036,684	31%
public schools	51-75%	10,035,581	6,190,189	23%
	76-100%	7,069,977	6,124,645	16%
	Total	44,193,644	19,042,282	

Source: 2007–08 NCES Common Core of Data; Note: includes schools reporting "0" free or reduced price lunch students

*Table A-24*Alternate Overlap Between Racial and Economic Concentration in Charter and Traditional Public Schools, 2007–08

			Percent o	of Black a	nd Hispa	nic Stude	nts in Sc	chools	•	
Free/Reduced					•					
Lunch										
Percentage in	0-	10-	20-	30-	40-	50-	60-	70-	80-	90-
School	10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
		Tra	aditional	Public Sc	hools (N	=78,444)				
0-10%	18%	15%	5%	2%	2%	2%	1%	1%	2%	5%
10-25%	23%	29%	25%	14%	6%	3%	2%	1%	1%	1%
25-50%	38%	36%	42%	44%	39%	30%	21%	11%	5%	4%
50-100%	20%	20%	29%	40%	53%	65%	77%	87%	93%	90%
% of Schools										
(Column										
Totals)	37%	11%	7%	6%	5%	4%	4%	4%	4%	11%
			Charte	er School	s (N=3,0	12)				
0-10%	31%	26%	18%	12%	11%	6%	4%	6%	2%	1%
10-25%	24%	31%	28%	24%	13%	8%	12%	5%	4%	1%
25-50%	25%	27%	29%	41%	41%	33%	23%	19%	15%	6%
50-100%	20%	16%	25%	22%	34%	52%	61%	71%	79%	92%
% of Schools										
(Column										
Totals)	19%	10%	7%	6%	4%	5%	5%	4%	7%	32%

Table A-25
Alternate Exposure to Low-Income Students by Race- Ethnicity & Charter School Status, 2007–08

_	Low-Income Students			
	Charter	Traditional Public		
% White	30%	33%		
% Black	66%	60%		
% Latino	61%	58%		
% Asian	40%	36%		
% American				
Indian	51%	54%		

Source: 2007–08 NCES Common Core of Data; Note: includes schools reporting "0" FRL students

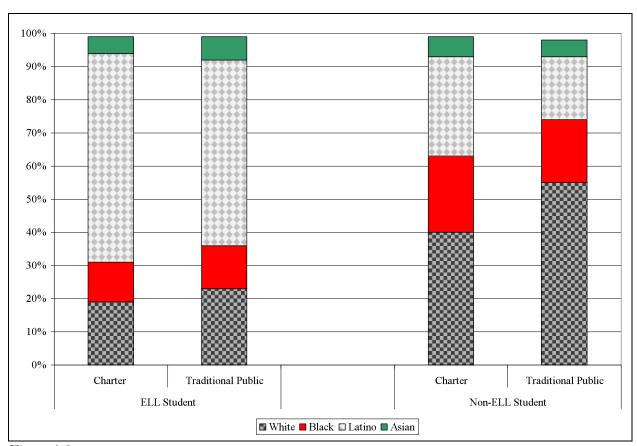


Figure A-8
Racial Exposure for Students by ELL and Charter School Status
Sources: 2007–08 NCES Common Core of Data; 200506 CRDC

About the Authors⁵⁰

Erica Frankenberg Pennsylvania State University

Email: euf10@psu.edu

Erica Frankenberg is an assistant professor in the Department of Education Policy Studies in the College of Education at the Pennsylvania State University. Her research interests focus on racial desegregation and inequality in K-12 schools, and the connections between school segregation policies and other metropolitan policies. She was formerly a senior research associate at the Civil Rights Project at UCLA. She holds an Ed.D. and an Ed.M. from Harvard University, and an A.B. from Dartmouth College.

Genevieve Siegel-Hawley University of California, Los Angeles Email: Gsiegelhawley@ucla.edu

Genevieve Siegel-Hawley is a doctoral student in Urban Schooling at UCLA and a research associate with the Civil Rights Project. Her research examines the impact of segregation and resegregation in American schools and explores viable policy options for a truly integrated society.

Jia Wang University of California, Los Angeles Email: <u>jia.wang.phd@gmail.com</u>

Jia Wang recently returned to the National Center for Research on Evaluation, Standards, and Student Testing at UCLA. Prior to that, she was a statistics analyst at UCLA's Civil Rights Project and the vice president of research at a non-for profit educational consulting firm. Her research interests emphasize applied educational measurement by: designing and managing research studies to evaluate the effectiveness of multi-site intervention programs; investigating how school, teacher, and student factors affect student achievement; and developing, validating, and evaluating assessment systems.

⁵⁰ The authors thank Teresa Abdulbaaqee for her help in preparing the article for publication. Gary Orfield, Daniel Losen, and Laurie Russman provided feedback on an earlier version of this article.

education policy analysis archives

Volume 19 Number 1

10th of January 2011

ISSN 1068-2341

Readers are free to copy, display, and distribute this article, as long as the work is attributed to the author(s) and **Education Policy Analysis Archives**, it is distributed for non-commercial purposes only, and no alteration or transformation is made in the work. More details of this Creative Commons license are available at

http://creativecommons.org/licenses/by-nc-sa/3.0/. All other uses must be approved by the author(s) or **EPAA**. **EPAA** is published by the Mary Lou Fulton Institute and Graduate School of Education at Arizona State University Articles are indexed EBSCO Education Research Complete, <u>Directory of Open Access Journals</u>, DIALNET, ERIC, H.W. WILSON & Co, QUALIS – A 2 (CAPES, Brazil), SCOPUS, SOCOLAR-China.

Please contribute commentaries at http://epaa.info/wordpress/ and send errata notes to Gustavo E. Fischman <u>fischman@asu.edu</u>

education policy analysis archives editorial board

Editor **Gustavo E. Fischman** (Arizona State University)
Associate Editors: **David R. Garcia & Jeanne M. Powers** (Arizona State University)

Jessica Allen University of Colorado, Boulder

Gary Anderson New York University

Michael W. Apple University of Wisconsin, Madison

Angela Arzubiaga Arizona State University

David C. Berliner Arizona State University

Robert Bickel Marshall University

Henry Braun Boston College

Eric Camburn University of Wisconsin, Madison

Wendy C. Chi* University of Colorado, Boulder

Casey Cobb University of Connecticut

Arnold Danzig Arizona State University

Antonia Darder University of Illinois, Urbana-Champaign

Linda Darling-Hammond Stanford University

Chad d'Entremont Strategies for Children

John Diamond Harvard University

Tara Donahue Learning Point Associates

Sherman Dorn University of South Florida

Christopher Joseph Frey Bowling Green State University

Melissa Lynn Freeman* Adams State College

Amy Garrett Dikkers University of Minnesota

Gene V Glass Arizona State University

Ronald Glass University of California, Santa Cruz

Harvey Goldstein Bristol University

Jacob P. K. Gross Indiana University

Eric M. Haas WestEd

Kimberly Joy Howard* University of Southern California

Aimee Howley Ohio University

Craig Howley Ohio University

Steve Klees University of Maryland

Jaekyung Lee SUNY Buffalo

Christopher Lubienski University of Illinois, Urbana-Champaign

Sarah Lubienski University of Illinois, Urbana-Champaign

Samuel R. Lucas University of California, Berkeley

Maria Martinez-Coslo University of Texas, Arlington

William Mathis University of Colorado, Boulder

Tristan McCowan Institute of Education, London

Heinrich Mintrop University of California, Berkelev

Michele S. Moses University of Colorado, Boulder

Julianne Moss University of Melbourne

Sharon Nichols University of Texas, San Antonio

Noga O'Connor University of Iowa

João Paraskveva University of Massachusetts, Dartmouth

Laurence Parker University of Illinois, Urbana-Champaign

Susan L. Robertson Bristol University

John Rogers University of California, Los Angeles

A. G. Rud Purdue University

Felicia C. Sanders The Pennsylvania State University

Janelle Scott University of California, Berkeley

Kimberly Scott Arizona State University

Dorothy Shipps Baruch College/CUNY

Maria Teresa Tatto Michigan State University

Larisa Warhol University of Connecticut

Cally Waite Social Science Research Council

John Weathers University of Colorado, Colorado Springs

Kevin Welner University of Colorado, Boulder

Ed Wiley University of Colorado, Boulder

Terrence G. Wiley Arizona State University

John Willinsky Stanford University

Kyo Yamashiro University of California, Los Angeles

* Members of the New Scholars Board

archivos analíticos de políticas educativas consejo editorial

Editor: **Gustavo E. Fischman** (Arizona State University) Editores. Asociados **Alejandro Canales** (UNAM) y **Jesús Romero Morante** (Universidad de Cantabria)

- **Armando Alcántara Santuario** Instituto de Investigaciones sobre la Universidad y la Educación, UNAM México
- **Claudio Almonacid** Universidad Metropolitana de Ciencias de la Educación, Chile
- Pilar Arnaiz Sánchez Universidad de Murcia, España
- Xavier Besalú Costa Universitat de Girona, España Jose Joaquin Brunner Universidad Diego Portales, Chile
- **Damián Canales Sánchez** Instituto Nacional para la Evaluación de la Educación, México
- María Caridad García Universidad Católica del Norte, Chile
- Raimundo Cuesta Fernández IES Fray Luis de León, España
- Marco Antonio Delgado Fuentes Universidad Iberoamericana, México
- Inés Dussel FLACSO, Argentina
- Rafael Feito Alonso Universidad Complutense de Madrid, España
- Pedro Flores Crespo Universidad Iberoamericana, México
- Verónica García Martínez Universidad Juárez Autónoma de Tabasco, México
- Francisco F. García Pérez Universidad de Sevilla, España
- **Edna Luna Serrano** Universidad Autónoma de Baja California, México
- **Alma Maldonado** Departamento de Investigaciones Educativas, Centro de Investigación y de Estudios Avanzados, México
- **Alejandro Márquez Jiménez** Instituto de Investigaciones sobre la Universidad y la Educación, UNAM México
- **José Felipe Martínez Fernández** University of California Los Angeles, USA

- Fanni Muñoz Pontificia Universidad Católica de Perú
- **Imanol Ordorika** Instituto de Investigaciones Economicas – UNAM, México
- Maria Cristina Parra Sandoval Universidad de Zulia, Venezuela
- Miguel A. Pereyra Universidad de Granada, España Monica Pini Universidad Nacional de San Martín, Argentina
- Paula Razquin UNESCO, Francia
- **Ignacio Rivas Flores** Universidad de Málaga, España
- Daniel Schugurensky Universidad de Toronto-Ontario Institute of Studies in Education, Canadá
- **Orlando Pulido Chaves** Universidad Pedagógica Nacional, Colombia
- José Gregorio Rodríguez Universidad Nacional de Colombia
- Miriam Rodríguez Vargas Universidad Autónoma de Tamaulipas, México
- Mario Rueda Beltrán Instituto de Investigaciones sobre la Universidad y la Educación, UNAM México
- **José Luis San Fabián Maroto** Universidad de Oviedo, España
- Yengny Marisol Silva Laya Universidad Iberoamericana, México
- Aida Terrón Bañuelos Universidad de Oviedo, España
- **Jurjo Torres Santomé** Universidad de la Coruña, España
- **Antoni Verger Planells** University of Amsterdam, Holanda
- **Mario Yapu** Universidad Para la Investigación Estratégica, Bolivia

arquivos analíticos de políticas educativas conselho editorial

Editor: **Gustavo E. Fischman** (Arizona State University) Editores Associados: **Rosa Maria Bueno Fisher** e **Luis A. Gandin** (Universidade Federal do Rio Grande do Sul)

- **Dalila Andrade de Oliveira** Universidade Federal de Minas Gerais, Brasil
- Paulo Carrano Universidade Federal Fluminense,
- Alicia Maria Catalano de Bonamino Pontificia Universidade Católica-Rio, Brasil
- Fabiana de Amorim Marcello Universidade Luterana do Brasil, Canoas, Brasil
- **Alexandre Fernandez Vaz** Universidade Federal de Santa Catarina, Brasil
- **Gaudêncio Frigotto** Universidade do Estado do Rio de Janeiro, Brasil
- **Alfredo M Gomes** Universidade Federal de Pernambuco, Brasil
- Petronilha Beatriz Gonçalves e Silva Universidade Federal de São Carlos, Brasil
- Nadja Herman Pontificia Universidade Católica Rio Grande do Sul, Brasil
- **José Machado Pais** Instituto de Ciências Sociais da Universidade de Lisboa, Portugal
- Wenceslao Machado de Oliveira Jr. Universidade Estadual de Campinas, Brasil

- **Jefferson Mainardes** Universidade Estadual de Ponta Grossa, Brasil
- **Luciano Mendes de Faria Filho** Universidade Federal de Minas Gerais, Brasil
- **Lia Raquel Moreira Oliveira** Universidade do Minho, Portugal
- Belmira Oliveira Bueno Universidade de São Paulo,
 Brasil
- António Teodoro Universidade Lusófona, Portugal
- Pia L. Wong California State University Sacramento, U.S.A
- Sandra Regina Sales Universidade Federal Rural do Rio de Janeiro, Brasil
- Elba Siqueira Sá Barreto Fundação Carlos Chagas, Brasil
- Manuela Terrasêca Universidade do Porto, Portugal
- Robert Verhine Universidade Federal da Bahia, Brasil
- **Antônio A. S. Zuin** Universidade Federal de São Carlos, Brasil